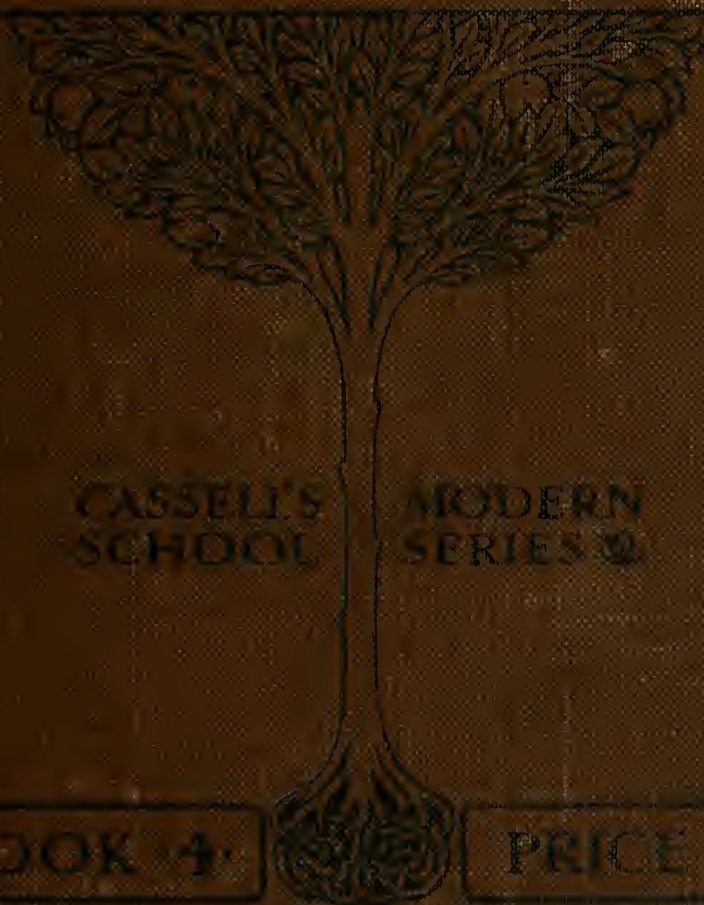


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SCOTLAND IRELAND AND CANADA

BY

T. W. BERRY

Director of Education, Rhondda

WITH EIGHT PLATES IN COLOUR AND
111 OTHER ILLUSTRATIONS

CASELL AND COMPANY, LTD
London, New York, Toronto and Melbourne

CASELL'S
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GEOGRAPHICAL SECTION

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PREFACE

THIS book aims at stimulating in boys and girls a keen interest in the British Isles and the Dominion of Canada. The treatment of Scotland and Ireland is given in much greater detail than is usually found in books purporting to deal with the geography of the British Isles.

The reader is encouraged to study the map and to gather all possible information from it. The geography of the three countries in relation to industry and commerce is dealt with, and the causes contributing to prosperity are fully noted.

Descriptive geography is given its proper place, so that readers may be trained to imagine, to appreciate, and to describe the respective countries. The association of history and geography is an advantage fully realised in these pages, whilst the method of comparison is used wherever possible. The economic value of geography will, it is hoped, be brought home to the readers by a careful study of this little book.

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SCOTLAND, IRELAND AND CANADA

PART I—SCOTLAND

CHAPTER I

THE BRITISH ISLES

What are the British Isles ?

As the name implies, there is **more than one island** constituting Britain. We often speak of Britain as **Great Britain and Ireland**, and these are the chief of the islands forming the British Isles. We also speak of the **United Kingdom of Great Britain and Ireland**, and the reason for this is not far to seek. The word "United" shows that two or more kingdoms have been joined together. Scotland and Ireland were once independent kingdoms, but, with England and Wales, they now constitute one kingdom ruled over by one Sovereign.

The **British Empire** is wider still. If we look at King George's official title, we find he is described as Sovereign "of the United Kingdom of Great Britain and Ireland and of the British Dominions beyond the Seas." It is the inclusion of these Dominions, known as **Colonies**

and Dependencies, that constitutes the Empire which is so extensive that the sun never sets on it.

The map of the British Isles shows us an **enormous number of small islands**, the majority of which are mere uninhabitable rocks. In addition to Great Britain and Ireland there are, however, the Isle of Man, the Outer Hebrides, the Orkneys and Shetlands, which are habitable. Separated from the coast of Great Britain by narrow channels are Skye, Mull, Jura, Islay and Arran, as well as several islands off the English coast.

Geographical Situation

The position of the British Isles is most **favourable both for climate and commerce**. They are near the Continent of Europe, and if you look at the globe you will see that they are in the middle of the globe. Britain is **in the centre of the land hemisphere**, a most important factor in our commercial prosperity. Its situation in the ocean between the old world and the new world is one of great advantage to our trade, and it is largely owing to our maritime position that we have been able to become the premier naval power in the world. The British Isles lie between 50° and 60° of latitude in the **North Temperate Zone**, and their position, together with the influence of the sea, makes our climate mild and suited for continuous work.

Great Britain

Great Britain is **the largest of the British Islands**, and consists of England and Wales in the south and

Scotland in the north. Scotland is much smaller than England and Wales, its climate is colder, its mineral wealth is more restricted, and its soil is less suited for agricultural purposes ; hence its population is also much smaller. The district where England and Scotland join is known as **the Border** and is traversed by the **Cheviot Hills**.

This border-land was the scene of much fighting in former times, and it was of this part that Scott spoke when he said, "The last of all the bards was he that sung of border chivalry." A little south of the Cheviots the **Roman Wall** runs across the country, just north of the **Tyne Gap** ;



Map of the British Isles

Scotland, Ireland and Canada

the road and railway between Newcastle-on-Tyne and Carlisle pass through this gap. For a long period England was held by the Romans, and this wall was built by the Emperor Hadrian as a barrier to keep out the Picts, who lived in the northern part of the island.

Ireland

Ireland lies to the west of Great Britain, from which it is separated by St. George's Channel, the Irish Sea and the North Channel. Ireland is much more compact than the other countries of the British Isles. Its **mountains** are more regularly distributed and lie near the coast. Its **coast** is less broken, and consequently it has fewer harbours and ports. Its **climate** is more humid, as we should expect from its exposed position in the Atlantic and the distribution of its mountains.

Ireland is **slightly larger than Scotland**, but it is **poor in minerals**, and therefore, as a manufacturing nation, it is **much less prosperous** than Scotland or England. Its moist climate makes Ireland more fitted for pasture than cereals. Its natural resources have not been developed with the energy displayed in other parts of the United Kingdom, partly owing to lack of capital, and partly through the character of the people, who are few in numbers and relatively poor. We shall see later how they live.

Patron Saints

Each country that helps to make up the British Isles has its own patron saint and flag, which are signs of

distinct nationality. **England claims St. George**, who although in no way associated with England, nevertheless is the symbol of all that is true and noble in the English character. **St. George's Day** is kept on the 23rd of April, and the **Rose** is the national flower.

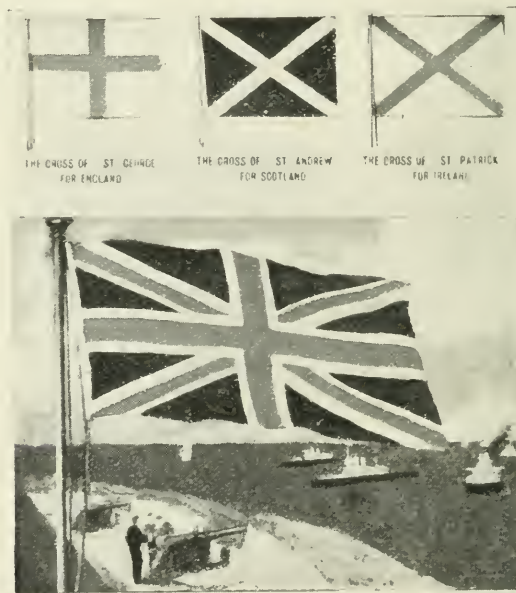
Scotland has St. Andrew, one of the twelve Apostles, as her patron saint, the **Thistle** being the Scottish emblem. **The Irish saint is St. Patrick**, whose work as a Christian missionary in Ireland is a matter of history. **The Shamrock** is the badge of Ireland. **Wales claims St. David**, a Welsh bishop of early times, as her patron, and the **Leek** is the national emblem.

National Flags

The flag of each country bears the cross of its patron saint. That of England is a red cross on a white ground. The Scottish flag is a diagonal white cross on a blue ground, and the Irish flag is a red diagonal cross on a white ground. **When England and Scotland became united** as one kingdom in 1603 the white cross of St. Andrew was added to the red cross of St. George, and about two hundred years later the Parliaments of **Great Britain and Ireland were united**. Then, of course, the red cross of St. Patrick was added to the combined flags of England and Scotland, these three flags making **the Union Jack**.

The Union Jack is representative of the power, justice and tolerance of Great Britain, and it has always been the refuge of the persecuted, and the

symbol of freedom and a reasonable liberty of the subject. All our warships and trading vessels carry this flag. Our public buildings and many of our schools proudly possess the Union Jack, which they take pleasure in displaying on special occasions. Now we see the full meaning of the name United Kingdom: one King, one Imperial Parliament, one Navy, one Army, and one People.



The Evolution of the Union Jack

CHAPTER II

THE MAP OF SCOTLAND: WHAT IT TEACHES

Geography as a Science

You have already learned the geography of England and Wales, and have found it not merely a string of facts but a subject of intense interest. You have seen that geography is a science, and not simply a record of facts. It is our business to find out the correct **reason for everything we observe**, and to apply it to other countries and see how far similar causes produce similar effects.

We know that **in the west of England the rainfall** is much heavier than in the east. Why is this? It is generally agreed that it is due to the fact that the moisture-laden winds blowing from the Atlantic give up their rain as a result of contact with the mountains. This is why we generally find more rain in the highlands than on the plains. Bearing this in mind, we are able to find out something about the climate of Scotland ; that is, whether it is humid or dry.

Questions of Latitude

You have learnt that the equator is the hottest region and that the poles are the coldest regions. Consequently, if a country is in the torrid zone or the tropics, it is hotter

than one in the frigid or polar regions. A consideration of this fact will give us a general idea of the climate of any country we desire to study. Thus a glance at the map of Scotland will show **the situation of the country**. The numbers of the lines of latitude become higher the farther north we go, and it will be seen that Scotland lies in latitude between 55° and 60° .

This is higher than the latitude of England, and from this fact we are safe in saying that unless there is some other great contrary force, **the climate of Scotland is colder than that of England**. A glance at the map also shows the position of Scotland as the northern part of Great Britain, and we can form an idea of the relative sizes of the two countries.

Coastline

Another peep at the map enables us to form some opinion of the coastline. The west is more rugged than the east. How do we know this from a study of the map? We see that there are many inlets, and numerous islands on the west, while the east coast is much less broken and the islands are few. From this we learn that the force of the Atlantic Ocean is very great on the west. If the coast were sandy the sea would wash it away evenly. But this is not so. The hard rocks resist the action of the sea; the soft soil is washed away, and the rocks remain as islets.

Mountains and Rivers

The **disposition of the mountains**, and their distance from the coast, enable us to tell whether the rivers are

long or short, swift or slow. If the mountains are rugged and high and lie near the shore, the rivers will be short and torrential ; if the mountains are far from the coast and not very high, the rivers will be longer and slower. Study the map and decide these questions.

Industry

People must live by industry, so that when we see the towns congregated we assume that there must be some **special industries** in

the locality. The map can therefore put us on the right train of thought in this respect. A glance at the map of Scotland at once shows that there are fewer towns in the north of Scotland than in the Clyde



Physical Map of Scotland

Valley. This is not an accident, and we shall see later on that the towns have arisen in the latter district be-

cause the natural resources of the place make it a good centre for trade and manufacture.

The **success of an industry** is largely dependent on two very important conditions. There must be good **means of obtaining the raw material**, and equally convenient **means of disposing of the products**



Industrial Map of Scotland

of industry. The ordinary map shows us the natural ports, and an industrial map shows us the railway system whereby the goods of the country are distributed.

The Map of Scotland

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Thus we see that the map of Scotland can teach us many important facts about the country, and hence we learn the value of always studying with the aid of the map.



Map of Scotland, showing the Ports

A glance at the map tells us at once the nature of the coast, the situation of the towns, the distribution of the mountains, and gives us a clearer idea than we could otherwise obtain.

CHAPTER III

THE SURFACE OF SCOTLAND

Physical Differences

SCOTLAND is divisible into two parts differing much in physical character. The portion north of the **Grampian Mountains** is known as the **Highlands**, and the southern portion is spoken of as the **Lowlands**. The difference is even seen in the rock formation of these divisions, for, although the mountain chains in the two portions of **Caledonia** have the same direction, they differ in composition. The people of the two parts of Northern Britain are of different origin, and the climate of the Highlands also differs very markedly from that of the Lowlands. We find at least two-thirds of the population of Scotland in the Lowlands. The working of the coal mines naturally attracted a large population to the Clyde Valley, while the mild climate, the fertility of the soil and the natural facilities for opening up communications contributed to the rapid growth of the Lowland towns. This development was further accelerated by commercial enterprise and improved means of communication.

The Border

In former times the **boundary between England and Scotland** was constantly changing as a result of the

fortunes of war. If you look at the map you will see that the boundary is now clearly defined, and consists of the **Solway Firth**, the **Cheviot Hills** and the **River Tweed**. Fortunately, however, the boundary is of little importance now because England and Scotland, formerly rivals and frequently at enmity, have gradually merged



The Tweed—the boundary between England and Scotland

into one nation. This was brought about in the beginning of the seventeenth century by the succession of a Scottish king to the English throne. James VI of Scotland, the son of Mary Queen of Scots, became by right of birth James I of England. The peaceful union of the two countries was the outcome of his accession. Suspicion and ill-feeling have been thrust aside, and to-day in their place we have mutual goodwill, a happy understanding and commercial exchange of goods.

For centuries before the union Border warfare had

been of frequent occurrence. In the year 1403, for example, the Scotch invaded England as far south as Shrewsbury. On the other hand, the English, by virtue of their superior strength of numbers, frequently invaded Scotland and laid waste the country. These Border frays, of course, benefited no one, and we are all glad to think that they are now only spoken of as events in history.

The Mountains

The **Cheviot Hills**, as we have seen, form an important part of the boundary. They are not very high, though as a result of a rigorous climate, snow is often seen on the peaks, and this severe weather interferes with the means of communication between the two slopes. The **Lowther Hills** may almost be regarded as a continuation of the Cheviots. These hills are also known as the **Lead Hills**. They reach an elevation of 2,750 feet, and form an important watershed in the courses of the Clyde, Tweed and Nith. At the north-east these high lands are connected with the hills known as the **Moorfoot** and the **Lammermuir Hills**. There is abundance of evidence that at a remote period numerous **volcanoes** were to be found in the district. The **Pentland Hills** are good examples of hills of volcanic origin. This range, whose summits do not reach an elevation of 2,000 feet, terminates to the south of Edinburgh. The isthmus of land between Glasgow and Edinburgh owes its fertility to the rich-

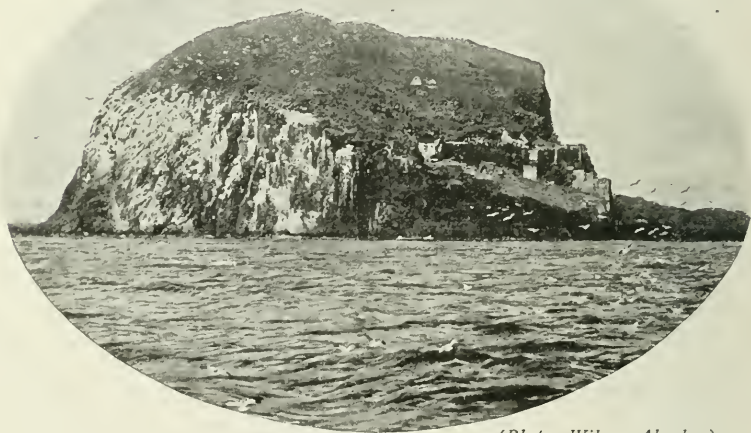
ness of its soil and subsoil, the hard rocks having been reduced in the course of time by the action of **glaciers**.

Comparisons

At this point let us see what we can learn by comparisons. Eastern Scotland has a fairly regular coast, while the shores of the west are deeply indented. Though England is a larger country than Scotland, the coastline of the latter is, owing to the numerous indentations, **700 miles longer than the English coastline**. In the east we have only one clearly marked peninsula, bounded on the north by the **Firth of Tay** and on the south by the winding **Firth of Forth**. In the west we have the prominent peninsula of **Galloway**, which juts out towards the Irish coast and terminates in the cape known as the **Mull of Galloway**. There are numerous lochs on the west, many of them running far into the land. There is also an immense number of islands in the west, while on the east there is almost an absence of islands. This difference is due to the west winds being heavily charged with moisture which fell as snow in the Ice Age. The glaciers formed at that remote period scooped out the valleys and produced the irregularities we have noted.

North of the estuary of the Clyde we have the beautiful **Loch Lomond**, one of the most picturesque lakes of Scotland, and one of the affluents of the Forth, widening out into the famous **Loch Katrine**, to which we shall refer in the chapter on scenic Scotland. In the

Firth of Clyde is the **Island of Arran**, rising in the peak known as **Goat Fell** to a height of nearly 3,000 feet. The **Isle of Bute**, also in the **Firth of Clyde**, is separated from the mainland by the **Kyles of Bute**, and is noted for its beautiful scenery. At the entrance



(Photo: Wilson, Aberdeen)

The Bass Rock

to the Firth of Forth is **Bass Rock**, which is 350 feet in elevation and has a castle on its summit.

The **Firth of Forth** is a very busy highway for ships trading with the Continent. It is spanned by one of the finest bridges in the world, although the **Forth Bridge** is not quite as long as the one which stretches from side to side of the Tay.

Northern Scotland has a mean elevation much higher

than that of England, and resembles Scandinavia in its coastline and surface. In the south the Highland region is bordered by the plain of **Strathmore**, and, stretching from **Loch Linnhe** to the **Moray Firth**, is a remarkable fissure known as **Glenmore**. Here we



The Forth Bridge

This bridge is one of the engineering triumphs of the world

have the **Caledonian Canal** connecting the Atlantic with the North Sea or the German Ocean. This canal utilises the waters of **Loch Ness** and **Loch Lochy**, and though the distance from the German Ocean to the Atlantic Ocean is close on one hundred miles, it was only necessary to excavate twenty miles to make the canal.

26 Scotland, Ireland and Canada

The mountains of Northern Scotland may be regarded as mainly embodied in the group known as **The Grampians**. There are many groups and chains of mountains separated by narrow glens which are generally occupied by lakes. To the north of the estuary of the Clyde we have several summits of high altitude, the best known of which are **Ben Lomond**, **Ben More** and **Ben Lawers**, each of them rising to over 3,000 feet above the level of the sea, and near **Loch Awe** in Argyllshire is **Ben Cruachan**, reaching the height of 3,670. In Inverness, on an arm of Loch Linnhe, is the imposing summit of Scotland's premier mountain, **Ben Nevis**, towering skywards to a



(Photo: Wilson, Aberdeen)

Caledonian Canal at Fort Augustus

The connecting link between the Atlantic Ocean and the North Sea



(Photo: Wilson, Aberdeen)

Ben Nevis and Ruins of Inverlochy Castle

height of 4,406 feet. Its peak is capped with snow, and its base is washed in two lochs. Ben Nevis is the western pillar of the Grampians proper, which stretch across the country and terminate to the south of Aberdeen. Towards the north-east are the two heights of **Cairngorm** and **Ben Mac Dhui**, the latter being the second highest mountain in Scotland and only just a little lower than Ben Nevis.

Farther north, and beyond the deep, narrow Glenmore, are the mountains of the **Northern Highlands**, which culminate in the peak of **Ben Altow**, 4,000 feet high. The mountains are gloomy and uninteresting, and are covered with dull, greyish heather and peat, while

28 Scotland, Ireland and Canada

very often they are enveloped in mists. Sheets of water are seen between the avenues of rocks and precipices, which are often several hundreds of feet deep.

The mountain ranges, valleys and rivers of Scotland have a general direction from the south-west towards the north-east. In all parts we see undoubted traces of the effect of the Glacial Age; the firths of Western Scotland, which are so similar to the fiords of Norway, are especially remarkable in this respect.

The Orkney Islands

Scotland can boast of about eight hundred islands, but less than one hundred and fifty are inhabited. Some of them we have noticed. To the north are the **Orkney Islands**, formerly known as the "Seal Islands." They are about six miles from the nearest point of the mainland, the **Pentland Firth** separating **South Ronaldsha** from **Duncansby Head**. The most important islands of this group are **Pomona, or Mainland**, and **Hoy**. They are inhabited by fishermen and agriculturists.

Shetland Isles

Farther north, for a distance of about fifty miles in the north-easterly direction, lie the **Shetland Isles**. This group consists of about one hundred islands, of which about twenty-four are peopled. The chief islands are **Mainland** and **Yell**. In the year 1588 the stragglers of the Spanish Armada were lost amongst these islands. The pasturage supports the spirited breed

of ponies for which the Shetland Isles are so famous. Fishing is the main occupation of the men.

The Hebrides

The Western Islands, or **The Hebrides**, are about four hundred and eighty in number, one hundred being



Shetland Ponies

inhabited. They form two large groups, **The Outer Hebrides** and **The Inner Hebrides**. These two groups are separated by a channel about twelve miles wide,

30 Scotland, Ireland and Canada

known as **The Little Minch**; while the **Outer Hebrides** are cut off from the mainland by **The Minch**. At the extreme north of this group is the **Butt of Lewis**, on Lewis-Harris, on which island the famous Harris tweeds are made from wool raised there. At the south of the outer group is **Barra Head**. Two of the group are known as **North Uist** and **South Uist**, the word "**Uist**" meaning "West." **Stornoway**, on the island of Lewis, is an important fishing town. Of the **Inner Hebrides**, **Skye**, **Mull**, **Islay**, **Jura**, **Iona**, and **Staffa** are the most important. The



(Photo: McIsaac & Riddle, Oban)

Fingal's Cave

Isle of Staffa is noted for the famous **Fingal's Cave**, which is two hundred feet long, seventy feet high and forty feet wide.

The Inchcape Rock

Although the east coast is not so indented as the west, yet there are several firths running far inland. The Firth of Forth we have already referred to, and to the north of it are the Firths of Tay, Moray and Dornock. Opposite the entrance to the Firth of Tay is the **Bell or Inchcape Rock**, on which the Abbot of Aberbrothok (Arbroath) long years ago placed the famous bell which was rung to caution the mariner. The Bell Rock still serves as a beacon to the sailor, for on it there now stands a splendid lighthouse, which was built in the year 1811.

No stir in the air, no stir in the sea,
The ship was still as she could be,
Her sails from Heaven received no motion,
Her keel was steady in the ocean.

Without either sign or sound of their shock
The waves flow'd over the Inchcape Rock ;
So little they rose, so little they fell,
They did not move the Inchcape Bell.

The Abbot of Aberbrothok
Had placed that bell on the Inchcape Rock ;
On a buoy in a storm it floated and swung,
And over the waves its warning rung.

When the rock was hid by the surge's swell,
The mariners heard the warning bell ;
And then they knew the perilous Rock,
And blest the Abbot of Aberbrothok.

Scotland, Ireland and Canada

The sun in heaven was shining gay,
All things were joyful on that day :
The sea-birds scream'd as they wheel'd round,
And there was joyaunce in their sound.

The buoy of the Inchcape Bell was seen
A darker speck on the ocean green ;
Sir Ralph the Rover walk'd his deck,
And he fixed his eye on the darker speck.

He felt the cheering power of spring,
It made him whistle, it made him sing ;
His heart was mirthful to excess,
But the Rover's mirth was wickedness.

His eye was on the Inchcape float ;
Quoth he, " My men, put out the boat,
And row me to the Inchcape Rock,
And I'll plague the Abbot of Aberbrothok."

The boat is lower'd, the boatmen row,
And to the Inchcape Rock they go ;
Sir Ralph bent over from the boat,
And he cut the Bell from the Inchcape float.

Down sank the Bell with a gurgling sound,
The bubbles rose and burst around ;
Quoth Sir Ralph, " The next who comes to the Rock
Won't bless the Abbot of Aberbrothok."

Sir Ralph the Rover sail'd away,
He scour'd the sea for many a day ;
And now grown rich with plunder'd store,
He steers his course for Scotland's shore.

So thick a haze o'erspreads the sky
They cannot see the sun on high ;
The wind hath blown a gale all day,
At evening it hath died away.



The Hills of Skye

On the deck the Rover takes his stand,
So dark it is they see no land.
Quoth Sir Ralph, "It will be lighter soon,
For there is the dawn of the rising moon."

"Canst hear," said one, "the breakers roar ?
For methinks we should be near the shore."
"Now where we are I cannot tell,
But I wish I could hear the Inchcape Bell."

They hear no sound, the swell is strong ;
Though the wind has fallen they drift along,
Till the vessel strikes with a shivering shock—
"O Heav'n ! it is the Inchcape Rock !"

Sir Ralph the Rover tore his hair ;
He curst himself in his despair ;
The waves rush in on every side,
The ship is sinking beneath the tide.

But even in his dying fear
One dreadful sound could the Rover hear,
A sound as if with the Inchcape Bell,
The devil below was ringing his knell.

SOUTHEY.



(Photo: Wilson, Aberdeen)

Loch Eil and Fort William

CHAPTER IV

THE RIVERS AND LAKES OF SCOTLAND

The Action of Rivers

WHEN studying the physical features of a country we must naturally give much attention to the rivers, which have a very great effect on the surface. Rapid rivers, which rise at a great height and have only a relatively short course, bring down a considerable amount of earth. This earth is first of all in the form of large pieces of rock, but **the action of the water, and contact with hard substances** on the sides or bed of the river, cause the pieces to become smaller and smaller. In this way pebbles are formed. Finally, what were once lumps of rock become fine particles of earth **held in suspension** by the water. The fast-flowing river carries on this debris to a level tract of land,

where, because the current is slower, the mud is deposited.

A simple experiment will serve to explain what happens. If we put some mud in a tumbler full of water and stir it rapidly, the water becomes murky. If the stirring ceases, and the water is allowed to become still, it clears and deposits the mud at the bottom of the tumbler.

This is exactly what happens in rivers, and the soil which is deposited by them is very rich, and is called **alluvial soil**.

How Rivers Alter the Surface

Rivers have also another action by which, in the process of time, they very considerably alter the surface of the land. We all know **the power of running water**. By this force a river wears away rocks, and widens its bed by washing away the banks, by which means the rivers are constantly tending to change the configuration of a country. It will thus be seen that one aspect of the study of rivers is inseparable from the study of the surface. In the same way, when considering the industries, we shall find it necessary and advisable to refer to the rivers because of the important part they play in the industrial and commercial prosperity of a country. In the chapter on picturesque Scotland, the rivers and the lakes—the latter in many cases merely expansions of the rivers—hold a prominent place in forming the beautiful landscapes for which Scotland is noted.

The Value of Rivers

Let us now look at the useful purposes served by rivers, noting the conditions under which rivers are most useful to man, and the various ways in which they contribute to man's happiness. For commercial purposes a river must not have a rapid current or it cannot safely be used for the purposes of navigation. Many of the Scottish



(Photo: Wilson, Aberdeen)

The Spey

rivers are very rapid; amongst these may be mentioned **several that flow to the north** from the Grampian Mountains; for example, the **Findhorn**, the **Spey** and the **Deveron**. These rivers rise at a height of about 1,500 feet, and as none of them has a course much longer than a hundred miles, the flow of the rivers is necessarily fast. The Spey is the fastest river in Scotland; it is, indeed, the most rapid in Britain. The **water parting of Scotland**—that is, the high land which divides the basins of the rivers—lies nearer to the western than to the eastern coast. What

is the result of this? Let us look at the map and we shall see that on the eastern coast the rivers have in consequence farther to travel to the sea than those on the western. The rivers flowing into the North Sea are, therefore, longer and slower than the other rivers of Scotland.

When it rains, what becomes of all the water on the roads? What becomes of the waste water we pour down the sink? Every boy and girl knows that **waste water finds its way to the sea**; but how does it get there? The rivers by which the land is drained carry all such water to the sea, and in this way help to keep a country healthy. **Very fast rivers often have cataracts** or waterfalls in their courses, and the force of the falling water due to the cataract can be used to produce electricity. This can be harnessed as the motor-power for driving machinery, or for illuminating buildings.

How dreary a country would be without rivers! On account of their beauty the pretty streams with which Scotland abounds are among the chief attractions for the tourist. Some of them have yet another attraction in the **salmon fishing**, for which many of them are famous.

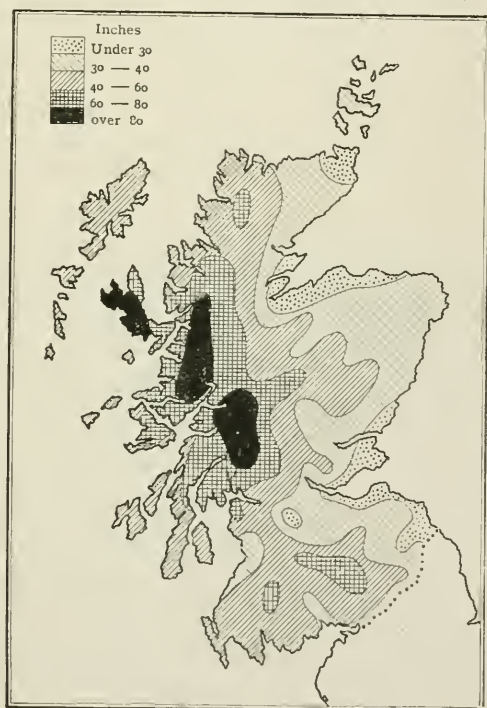
The Best Commercial Rivers

We have seen that if rivers are to be of any use for navigation they must not be too fast. On the other hand, **rivers that are almost still are of little value**, hence **tidal rivers are very useful** for commercial purposes. **Shallow rivers are not of much use**, for big vessels could not be navigated on them, and that is why it was

found necessary, at an enormous expense, to deepen the **Clyde**. A river must be moderately wide if large boats are to pass each other. Another very important consideration is the district through which the rivers flow.

If a river drains a country which is rich in minerals, or one that has a great agricultural fertility, or perhaps one possessing both these favourable conditions, it may form a very useful outlet for the produce and manufactured goods of that district. A good estuary is a great advantage, and the relative position of its estuary to other commercial centres is a factor in the prosperity of a river. The estuary of the Clyde, for example, is easily accessible from England, and it is near to Ireland, and these things contribute to its great commercial prosperity.

Taken as a whole, Scotland is a **well-watered country**, but the heaviest rainfall is naturally in the mountainous



Rainfall Map of Scotland

districts, reaching over 80 inches per annum in the Western Highlands, while the annual rainfall of England is, in the heaviest districts, from 60 to 80 inches.

The Clyde and the Tweed

We have read about the **Clyde**, and by the aid of the map we can trace its course from its source in the centre of the southern uplands to its mouth in the **Firth of Clyde**. It flows for about 98 miles through the chief industrial district of Scotland. The **Tweed** is one of the best known rivers in Scotland. Politically, it was of considerable interest in bygone times, as it forms part of the boundary between England and Scotland. It rises in the same district as the Clyde, and flows in an easterly direction, emptying itself into the North Sea. In its basin are the important "Tweed" towns of Galashiels and Hawick, and another portion of its course flows through good pasture land.

The Rivers of the West

Flowing into the Solway Firth we have the **Dee**, **Nith**, **Annan** and **Esk**. These rivers flow through agricultural land, and the people are engaged in dairy farming and sheep-rearing. The district is sparsely populated and the rivers are not important. **Dumfries** on the Nith is the only town of any importance. Four small rivers drain the Ayrshire coalfield, viz. the **Girvan**, the **Doon**, the **Ayr**, at the mouth of which stands the town of **Ayr**, and the **Irvine**.

Rivers of the East

On the east we have the **Forth**, which rises near **Loch Lomond** and flows south-easterly, emptying itself into the **Firth of Forth**. On its right bank is **Stirling**. The rivers **Earn** and **Tay** both flow into the **Firth of Tay**. The **Tay**, which is about 120 miles long, and is **the longest river in Scotland**, rises in the Highlands and flows in an easterly direction towards the North Sea, passing through the fertile plain of **Strathmore**. On its estuary stands **Dundee**. **Perth** is also on the river Tay. The famous **Tay Bridge** spans the river. Looking farther north we see the river **Dee**, with **Aberdeen** at its mouth, and the three rivers already referred to in the earlier part of the chapter, the **Findhorn**, **Spey** and **Deveron**.



The Tay Bridge

*(Photo : Wilson, Aberdeen)*

Loch Lomond

The Lakes

In a country which has been subjected to glacial forces it is natural to expect to find valleys, depressions and hollows which, with the aid of a heavy rainfall and overflowing rivers, soon become lakes or lochs. Scotland has **many beautiful lakes**, which occupy a prominent place in the consideration of picturesque Scotland. They are nearly always found in river valleys. In the Northern Highlands are **Lochs Shin** and **Moree**; and, utilised in the construction of the Caledonian Canal, are **Ness, Oich** and **Lochy**. **Loch Lomond**, which is about 24 miles long, is the largest lake in Scotland, and **Loch Katrine**, of **Trossach** fame, is the most beautiful. **Loch Awe**, in Argyll, and **Loch Tay**, in the Tay Valley, are also well-known lakes. **Loch Linnhe** is a large inlet of the sea on the west coast. Near it is **Loch Eil**, overlooked by Fort William.

CHAPTER V

INDUSTRIAL SCOTLAND

Means of Subsistence

As we have seen, the size of the population depends upon the **productiveness of a country**. A barren rock incapable of agricultural produce and devoid of mineral wealth, and having no other means of sustaining a population, is of little commercial value. We find the **population the most dense where there are the best means of subsistence**.

We require **coal for all our manufactures**, because the driving power in this country is all derived from coal, whether it be in the form of steam or electricity. **Iron, the most useful of all metals**, plays an important part in our manufacturing world, because the bulk of the machinery is made from this metal. When coal and iron are found together in abundance, we have ideal conditions. Fortunately, Scotland is in this happy condition, and we find important well-worked coal and iron fields in the Central Lowlands.

One of the chief coalfields is that of **Ayrshire** in the west. Look at the map and notice the position, the nature of the surface and the nearness of the coalfields to the sea. **The Lanarkshire Coalfield**, between the Clyde

and the Forth, occupies the busiest industrial district of Scotland. Then, beyond the Pentland Hills, we have the **Midlothian Coalfield**, and to the north of the Firth of Forth lies the **Fife Coalfield**.

Shipbuilding on the Clyde

Remembering the natural resources of the basin of the Clyde and noting the important port at the mouth of the river, we shall not be surprised to find the people engaged in shipbuilding. Here we find the busiest shipyards in the world. **Glasgow** is the great city of the Clyde's basin. In the Ayrshire coalfield we have the ports of **Ardrossan**, **Troon** and **Ayr** all engaged in shipbuilding; **Port Glasgow is the largest ship-building centre in the world**, and **Kilmarnock**, just a little inland, is an engineering town.

Industries in the Lanarkshire Coalfield

Cotton-spinning is carried on in the Lanarkshire coalfield, a district well suited for this, owing to the humid climate. **Other industries** which give employment to thousands in this part of Scotland are those concerned with the manufacture of woollen goods and silk goods. In addition to these, important metal works and chemical works, and lesser industries, are to be found everywhere. **Iron-smelting** is also largely carried on in this district, the towns of **Motherwell**, **Airdrie** and **Wishaw** being important centres. **Hamilton** is a busy coal-mining town.



(Photo supplied by Messrs. John Brown & Co.)

A Fitting-out Basin in a Clyde Shipbuilding Yard

To what reasons can we attribute the rapid growth in the population, industry and prosperity of the Central Lowlands? The fact that there is an **abundance of coal and iron** is not in itself sufficient; there must be an **energetic people** capable of working in these industries, and there must also be a **demand for the natural products and the manufactured goods**. The **inventions of our engineers** made the use of steam power possible and, later, imperative, and so caused a big demand for iron goods. The **invention of the locomotive** and the rapid growth of railways affording

quick and comparatively cheap means of transit, made the interchange of industrial products easy and profitable. People flocked to the districts where the natural products and local conditions favoured industry, and where they received a fairer wage for their work; hence the population of the Lowlands rapidly increased.

Clothing and Manufactures

We have all heard of the River Tweed which forms part of the boundary between England and Scotland, and we have seen in the shop windows such expressions as a "Tweed Suit" and "Tweed Cloth." What is the connection? If we look at the map we shall see that the Tweed basin has several towns; if we visit the district we shall find that **sheep are reared on the hills**, and that **the towns are engaged in the manufacture of woollen cloth** from the raw material thus locally produced. The cloth is of excellent quality and noted for its durability. The chief towns engaged in the manufacturing of Tweed cloth are **Hawick, Galashiels, Selkirk and Dumfries.**

Linen and Jute

Linen and jute are important articles of manufacture in Scotland. The **flax is imported from Western Europe and India**, and is **manufactured into linen at Dunfermline, Arbroath, and Montrose.** **Dundee is the chief jute centre.** Perth, the noted town for dyeing, is also engaged in the manufacture

of linen and jute goods. A plentiful supply of water gives Perth the necessary means for cleaning and dyeing fabrics.

Aberdeen Granite

Almost every boy and girl has heard of **Aberdeen granite**. The town is built of this excellent native product. The stone is expensive in England because of the big cost of carriage in bringing it so far. This stone takes an excellent polish and is seen in the façades of some of our most



Granite Quarry, Aberdeen

important buildings, as well as in monumental constructions in our towns and cemeteries. The granite is obtained from the quarries round about the town, and large numbers of men are engaged in this industry.

Rural Scotland

Leaving the towns, let us look at Rural Scotland, and see how the people live in these districts. **The soil is the source of wealth** whereby the small population found in the country districts subsists. Two conditions at least determine **the agricultural prosperity of a country**. The first of these is the climate, which, in other words, means the amount of heat and sunshine, as well as the extent of the rainfall ; and the second is the natural productiveness of the soil. The heavy rainfall and the swiftly flowing rivers cause much soil to be washed away, leaving the hard, unyielding rock for the farmer's cultivation. **The Highlands**—as we call the land north of the Grampians, for reasons which the map cannot fail to suggest—has very poor soil. The hills are composed of old and hard rocks, covered with only a thin layer of soil, and consequently the grass is poor. **Oats** are grown where the soil is deeper, and, with less success, potatoes. No wonder, then, that this part of Scotland is the **sportsman's paradise**. **Grouse are preserved on the moors and heather hills**, and sportsmen go north in August to shoot them. **Deer forests** are found here, and **Shetland ponies, rough-coated cattle and hardy sheep** are reared in the Highlands.

Farther south we find greater fertility. **Aberdeenshire** is the richest agricultural county of Scotland. The famed **Scotch oats** are grown here, **grain is produced** and **cattle-rearing** forms an important industry.

Agriculture in the Lothians

In the Lothians **wheat, oats, potatoes** and **turnips** are produced; the rainfall is less here, and skilful farming is possible. Every grocer's shop displays **Dundee jams**. Why is this particular industry found in Dundee? The **Carse of Gowrie**, to the north of the Firth of Tay and the Clyde Valley, is noted for the **cultivation of fruit**. Large quantities of **strawberries** are produced, and these are sent to Dundee and made into jam.

Dairy Farming in Ayrshire

Ayrshire is noted for its dairy farming. The **climate is moderately mild**, and there is good pasture land; consequently Ayrshire cattle are of the best, and yield plentiful supplies of good rich milk. **Sheep-rearing** is another important branch of farming in this fertile district.

Fisheries of Scotland

Scotch haddocks and Scotch kippers are seen in every fish shop throughout the kingdom. Why? Because the Scottish **fisheries** are noted not only for the size of their annual "catch," but also for the skilful curing carried on. All along the east coast we find large numbers of people engaged either in manning the fishing fleets, or cleaning and curing fish, or in getting it to market to be transported to places where it is needed. **Herrings, cod, haddocks, sole and plaice** are the chief sea fish, while the **rivers supply excellent salmon and trout**. The chief fishing stations are **Lerwick** in the



Scotch Fish Cleaners at Work

Shetland Isles, **Wick** in Caithness, **Fraserburgh**, **Peterhead** and **Aberdeen** in the county of Aberdeen, and **Stornoway** in the Outer Hebrides.

The People and their Prosperity

Probably in no country in the world has **the character of the people** had such a **marked effect on the commercial, industrial and agricultural prosperity of the land** as it has in Scotland. The frugality, energy, perseverance and skill of the Scot enable him to get the best out of a climate not too favourable, and as a result of his enterprise the soil yields the maximum benefits. Even in his sheep-rearing and cattle-rearing the Scot has by no means an easy lot, for the winters are very severe, and the shepherd has to tend his flocks on snow-clad hills, swept by biting winds.

CHAPTER VI

THE INDUSTRIAL TOWNS OF SCOTLAND

Association of Country and Towns

WHEN we hear the name of a country mentioned, we immediately think of its famous cities. **England**, for instance, recalls, amongst many others, **London, Birmingham, Liverpool** and **Manchester**. The name of **Ireland** suggests **Dublin** and **Belfast**. **France** is at once associated in our minds with **Paris**, while the name of **Italy** makes us think of its historic capital, **Rome**; and so on throughout the countries of the world. When we think of Scotland we immediately recall the names of some of her most famous towns, **Edinburgh Glasgow, Aberdeen, Dundee**, and so on.

Edinburgh

Edinburgh, the **capital of Scotland**, is situated **on the Firth of Forth**. It is more famous for its beauty and history than for its trade and commerce. We shall read about it in the chapter on Picturesque Scotland.

Glasgow

Glasgow **on the Clyde**, in Lanarkshire, is **foremost among industrial cities**, and is the second city in size in



The Cheerless Winter Day

(From the picture by Joseph Loughran, in the National Gallery of British Art)

the British Isles. In no sense can it compare in beauty with Edinburgh. Its **industries are remarkable in variety**, and include **cotton-spinning, silk-weaving**, the manufacture of **woollen materials and jute goods, metal-works, glass manufacture, pottery, chemical works, shipbuilding**; in fact, in every branch of industry Glasgow holds a prominent place. There is a **thorough railway system**, so that communication between Glasgow and every part of the kingdom is easy. Its **commerce is great**, being, of course, governed chiefly by its industries.

The River Clyde

The natural drawback of having a small river, which was too shallow for the navigation of large vessels, was overcome in the seventeenth century, when **docks were**



In a Pottery
at Glasgow

excavated and warehouses were erected at **Port Glasgow**, on the southern bank of the Clyde. In the year 1875 the lower Clyde was completely embanked. The effect of this was to confine the water and increase the depth of the river. A **great system of dredging** has further deepened the river, and as a result the large ocean "greyhounds" can



The Docks, Glasgow

now navigate the Clyde where it was formerly so shallow as to be forded. The Clyde has the honour of being **the first river** in the world to be regularly navigated by steam vessels. We thus see how determination and energy have transformed an inland town into a great maritime port.

Glasgow has grown from excessive immigration rather than from a big birthrate, and in this way much poverty

has been imported. The city can boast of a university founded in the fifteenth century.

Dundee

Dundee is an ancient city in Forfarshire. It is situated **on the Firth of Tay.** In population it is the **third town of Scotland.** Formerly Dundee was noted as the centre of the whale-fishing industry; to-day the city is the **second in the country in industrial importance.** Jute is now imported from India, and **jute-weaving is the staple industry.** Flax is manufactured into **linen goods, hemp yarns are spun** and immense quantities of sacks and packing sheets are made. Dundee is noted for its **jams and marmalade,** and as a port it has an **important export and import trade.** There are also **engineering works and shipyards,** and the **high-sea fisheries** find occupation for the mariners of Dundee.

The River Tay

The town extends for several miles along the northern bank of the Tay. This river rises in the south-west mountains of Perthshire at a height of about 3,000 feet. Draining the country it empties itself into the Firth of Tay, carrying to the sea **a volume of water unequalled by any other river in the British Isles.** At Dundee the river is nearly two miles in width, and, notwithstanding this, engineers succeeded in spanning it with a railway bridge. This, unfortunately, was the scene of a terrible disaster, for during a terrific gale in 1879 the

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structure was precipitated into the Tay at a time when a passenger railway train was crossing the bridge.

Aberdeen

On the east coast, in the county of Aberdeen, the city of the same name is **situated at the outlet of the**



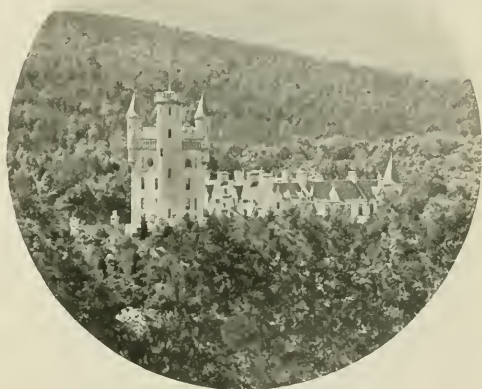
Dundee and the Tay Bridge

valleys of the rivers Dee and Don. The name means "the mouth of the Dee," *aber* meaning mouth. For centuries Aberdeen carried on a brisk trade with France, Northern Europe and the Low Countries, and its harbour was largely used when Edinburgh and Glasgow were mere villages. Some interesting edifices are to be found in a long street known as **Old Aberdeen**, to

the north of the commercial quarter of the modern town.

The Industries of Aberdeen

Provided with **spacious docks and protected by piers**, Aberdeen has **considerable export trade** created by its own industries. There are important **ship-building yards**, and the industries of the town include **flax manufacture, cotton-spinning, woollen-weaving, engineering factories, foundries, chemical works, soap manufacture and india-rubber works.**



Balmoral Castle

Quarries are worked in the neighbourhood, and the **yards for polishing granite and marble** are unequalled in Great Britain. Aberdeen is a **busy fishing centre**. An ancient university is found here, which is largely attended by students to-day.

The River Dee

The Dee, especially in its upper valley, is much frequented by tourists on account of the **picturesque**

scenery and pastoral beauty. **Balmoral**, the royal **residence** in the Dee valley, was much beloved by Queen Victoria, and is a favourite home of our present King and Queen.

Perth

Though widely known, Perth is not as large as the towns previously mentioned, yet it is of **considerable industrial importance**. Its **geographical position is admirable**. The Tay is navigable at this point for vessels drawing nine feet of water, and the town is situated in the valley that provides the only easy means of communication between Fife and the fertile districts of Strathmore. The situation of Perth naturally adds to its strategic importance, and it was probably due to this that it was **formerly a Roman station**.

In later times Perth became the capital of Scotland, and at the neighbouring town of **Scone** the ancient kings of Scotland held their court. Every boy and girl must have read of the famous stone of Scone on which the coronation of Scottish monarchs took place. This stone was kept in Scone Abbey, which is now in ruins, but Edward I of England had it transferred to Westminster Abbey, where it remains as one of the great historical relics.

Perth, now **no longer of political importance**, is noted as a **busy manufacturing town**. There is an abundance of water, and this has made it possible to develop an **extensive bleaching, cleaning and dyeing industry**. There are also **flax mills** engaged in linen

manufacture, woollen factories, glasshouses and engineering shops.

Stirling

The county town of Stirlingshire is Stirling, on the Forth, and occupies a similar position **on the Firth of Forth** to that of Perth on the Firth of Tay. **Its site is admirably adapted for the defence of the Forth**, and many events are recorded in the history of Scotland directly associated with **Stirling Castle**, which stands on a high volcanic rock overlooking the river, and thus commands the town. From the battlements of this castle a view unsurpassed in all Scotland for beauty opens out to the eye, and extends from the lofty **Grampians** along the course of the River **Forth** to the firth of that name.



Stirling Castle

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In the neighbourhood of Stirling is **Bannockburn**, of which every Scot is proud, for it was there, in 1314, that Robert the Bruce defeated the English and secured the independence of Scotland. No wonder, then, that in Stirling we find a colossal statue of Robert the Bruce, while on the opposite side of the valley is a tower commemorating the first victory of Wallace in 1297. There is an **important railway junction** at Stirling.

Greenock

Situated on the Firth of Clyde, Greenock is an important manufacturing town in the county of Renfrew. Like its neighbour, Port Glasgow, it is **mainly engaged in shipbuilding**, while it has also a **big trade as a port**. **Sugar is imported** from the West Indies and is refined in Greenock. The town is also engaged in **cotton-spinning**, while amongst other industries are **pottery works, machine shops, worsted and jute factories and starch works**. The townspeople have erected a marble statue to the memory of James Watt, of steam-engine fame, for Watt was a distinguished son of Greenock.

Inverness

Inverness is known as **the capital of the Highlands**. The town has an **exceptional geographical position** upon a deep firth **at the head of the great Caledonian Canal**, which cuts Scotland into two parts. Near the town is **Culloden Moor**, which saw the final defeat of the House of Stuart. The climate is cold, and

this has in a great measure prevented the development which should have taken place. Inverness otherwise enjoys many natural advantages.

Some Other Towns

Of other important towns, we may mention the following: **Paisley**, in Renfrewshire, is a town having a big reputation for the **manufacture of sewing-cotton**, as well as **tartans**, **woollens** and **machinery**. Paisley shawls were very famous some years ago.

Kilmarnock, in Ayrshire, makes **carpets**, and **Dunfermline**, in Fife, makes **fine linen**. **Montrose** and **Arbroath**, both on the North Sea and in the county of Forfar, are also engaged in the **manufacture of linen goods**. **Dumbarton**, on the Clyde, in the county of the same name, has **shipbuilding yards and iron foundries**. **Wick**, in the county of Caithness, in the north of Scotland, and **Peterhead**, in the county of Aberdeen, are the **headquarters of the herring fishery** and the starting-point of fleets engaged in the whale fishery. **Campbeltown**, in Argyllshire, in the south of the peninsula of Cantyre, is **noted for its distilleries** and has a large trade in whisky.

CHAPTER VII

PICTURESQUE SCOTLAND

Bonnie Scotland

O Caledonia! stern and wild,
Meet nurse for a poetic child;
Land of brown heath and shaggy wood,
Land of the mountain and the flood,
Land of my sires, what mortal hand
Can e'er untie the filial band
That knits me to thy rugged strand!

So says Sir Walter Scott, the poet and romancer of Scotland—the land we often hear people speak of as “**Bonnie Scotland,**” and not without reason. It is far from being merely a fanciful title. For the country north of the Cheviots has almost unrivalled beauty especially when the gorse is in bloom and the heather has spread its carpet.

Not only is the country north of the Tweed interesting because of the **beautiful scenery**, but also because of its **historical associations**. In this chapter we will look at some of the charming spots and noted places of interest frequented by the many tourists who love to spend their holidays in **the country of Burns and Scott**.

The rivers especially attract our attention, and many

of them have **beautiful cataracts**. The river Clyde is famous for these cataracts in its upper course, and among them may be mentioned Cora Linn, Bonnington and Stonebyres. Near the town of Ayr, we



(Photo: Bara, Ayr)

Burns's Cottage, near Ayr

The door on the left is the entrance to the old cottage, which was built by the poet's father

have **Burns's cottage**, which attracts all lovers of true poetry.

“The Athens of the North”

Edinburgh, the capital of Scotland, derived its name from Edwin, who was one of the early kings of Northumbria. It occupies a **unique and majestic position**, being built on a series of hills. This, together with its **historical associations**, makes it the goal of all tourists to Scotland. It is not only the capital, but it is also the **centre of learning**, and is said to be without a rival among the cities of Europe. We do not wish to forget the charms of



Edinburgh Castle

Oxford, with its “dream of spires,” nor Paris, the capital of France, with its stately boulevards, nor yet Geneva, the beautiful town of Switzerland. But notwithstanding these and other famous cities, Edinburgh is almost unsurpassed in its picturesque surroundings. For twelve centuries it has been the site of a fortress. James VI of Scotland, who became James I of England, and thus united the two kingdoms under one sovereign, in 1603, was born in **Edinburgh Castle.**

This castle is an ancient picturesque building of irregular shape to which modern additions have been made. One of Edinburgh's most famous buildings is the old royal palace

of **Holyrood**, near which lie the ruins of the ancient abbey. Holyrood Palace is closely connected in history with the tragic career of Mary Queen of Scots. Old Edinburgh, which proved too small for the growing city, is joined to this new Edinburgh by bridges in the north and south. The new parts of the city have been skilfully laid out, and beautiful gardens with fine statues have added to its charm. Its imposing appearance has been further enriched by its magnificent buildings of stone and marble, the product of neighbouring quarries.

An excellent view of the city may be obtained from **Arthur's Seat**, an elevation of over 800 feet. From here the spectator can see the city with its fine public buildings, monuments and gardens. Beyond the city lies the beautiful country: the Firth of Forth with its ports is seen, and away in the distance towers Ben Lomond.

Art and Science in Edinburgh

The Scotch speak of Edinburgh with considerable pride as "**The Athens of the North.**" To those who are familiar with Athens Edinburgh is reminiscent of the Grecian capital, while the long list of clever men who have gone forth from Scotland's famous seat of learning provides another right to this proud title. Edinburgh's University was founded as far back as 1582. It possesses a valuable Library and a Museum of Science and Art. The city has also a Royal Institution and a National Museum of Antiquities, as well as a National Gallery of Paintings and a National Portrait Gallery. There are also Zoological and

66 Scotland, Ireland and Canada

Botanical gardens, and the fine old Gothic Cathedral of St. Giles is also worthy of note. This building fortunately escaped destruction at the Reformation. The principal thoroughfare, **Princes Street**, possesses some of the finest shops in the United Kingdom. Edinburgh is not a



Holyrood

manufacturing town. **Leith is its port**, and it is a pleasant sail from its busy quays to the famous **Forth Bridge**—one of the finest triumphs of engineering in the world. **Portobello is the chief watering-place** in the neighbourhood, and is largely visited by the people of Edinburgh.

Linlithgow Palace appeals to us as the place where the

unfortunate Queen Mary of Scotland was born, and it was from its turret that Queen Margaret looked in vain for the return of James IV from the battle of Flodden Field in 1513, when, after a desperate engagement, the Scots were completely defeated and Scotland's king was amongst the fallen.



Leith

The port of Edinburgh

Round about Glasgow

Glasgow is of interest as a great industrial centre, and we read of this town when considering the important manufacturing towns. There is little of the picturesque in the city itself, but the vicinity is full



Dumbarton Rock and Castle

of interest owing to its many resorts among the lochs and islands of the lovely Firth of Clyde. At **Cardross**, just below Dumbarton, King Robert the Bruce spent his last days. **Dumbarton**, with its rock and castle, is a noted town, and it is interesting to remember that Dumbarton refused to be made a port because the farmers feared the effect of transforming their town into a seaport, and Glasgow gained what Dumbarton lost. **Rothsay**, on its magnificent bay, lies at the mouth of the **Kyles of Bute**, and is an attractive watering-place. Close by is **Mount Stuart**, the seat of the Marquis of Bute, whose mansion is said to be the most magnificent private residence in Scotland. **Old Rothsay Castle** is steeped in historical lore. The **Island of Arran** is a famous summer resort in the Firth of Clyde. It is visited by tourists on account of its beautiful scenery.



Loch Katrine
The beauty spot of the Trossachs

The Covenanters' Country

The country to the south of Glasgow, lying among the uplands of Renfrew, Lanark and Ayrshire, is known as the **Covenanters' Country**. This was the scene of the struggles in the reign of Charles II and James II. **Bothwell Bridge** is noted for the overthrow of the Covenanters by Monmouth, which took place in 1679. **Hamilton Palace**, closely connected with many historical events, is one of the attractions of the Clyde.

The Trossachs

Sir Walter Scott, in "The Lady of the Lake," has for ever made famous the district known as "**The Trossachs**," and **Loch Lomond**. The country here is of extraordinary beauty, and forms one of the fairest spots



Rothesay

(Photo: Wilson, Aberdeen)

in this fair land. **Loch Katrine**, so beautifully described by Sir Walter Scott in the above-mentioned poem, is said to resemble the famous Lake of Lucerne with its precipitous rocks and grand scenery. Silver Strand, on the shore of the loch, and Ellen's Isle possess natural charms which draw tourists from all parts of the world. As one writer remarks, a walk through the Trossachs to Loch Katrine crowds as much of Nature's loveliness into about a mile of space as any traveller could hope to see. Vistas of exquisite woodland interspersed with moss-covered boulders, fringed by ferns and stained with lichen, everywhere meet the eye. A sail on beautiful Katrine is like a glimpse of fairyland, the fine sky above and the placid waters beneath.

Loch Katrine, however, has also a **very definite use** in the daily life of Glasgow, for it provides the great city with a constant supply of pure water. Loch Lomond is drained by the River Leven into the Clyde. It is one of Scotland's most beautiful lakes, and its scenery cannot be excelled in its variety, rugged crags contrasting with gentle hills and beautifully wooded islets. Near the northern extremity of the Lake, Ben Lomond towers to a height of over 3,000 feet.

Stirling, with its castle, and **Bannockburn**, the famous battlefield, we have already noticed. Both are crowded with memories, and demand a visit on account of **their fame in the annals of Scottish warfare**. **Bridge of Allan**, a Scottish spa to the north of Stirling, is much frequented for the sake of its mineral

spring. It is situated in the heart of a beautiful country.

Highland Scenery

There is quite a different character in the Highland scenery, amidst which lies the wild and gloomy **Pass of Glencoe**, in Argyllshire.

Sir Walter Scott thus describes the Highland scenery in "The Lady of the Lake":

A wildering path!—they winded now
Along the precipice's brow
Commanding the rich scenes beneath,
The windings of the Forth and Teith,
And all the vales between that lie,
Till Stirling's turrets melt in sky;
Then, sunk in copse, their farthest glance
Gained not the length of horseman's lance.
'Twas oft so steep, the foot was fain
Assistance from the hand to gain;
So tangled oft, that, bursting through,
Each hawthorn shed her showers of dew,
That diamond dew, so pure and clear,
It rivals all but Beauty's tear!

At length they come where, stern and steep,
The hills sink down upon the deep.
Here Vennachar in silver flows,
There, ridge on ridge, Benledi rose.
Ever the hollow path twined on,
Beneath steep bank and threatening stone;
A hundred men might hold the post
With hardihood against a host.
The rugged mountain's scanty cloak
Was dwarfish shrubs of birch and oak,



(Photo: Wilson, Aberdeen)

View on Loch Awe

With shingles bare, and cliffs between,
 And patches bright of bracken green,
 And heather black, that waved so high
 It held the copse in rivalry.
 But where the lake slept deep and still,
 Dank osiers fringed the swamp and hill ;
 And oft both path and hill were torn,
 Where wintry torrents down had borne,
 And heaped upon the cumbered land
 Its wreck of gravel, rocks and sand.

Oban, also in Argyllshire, is a popular resort of Highland tourists, who often make it their headquarters. From here we can drive through the **Pass of Brander**, or even enjoy the delightful solitude

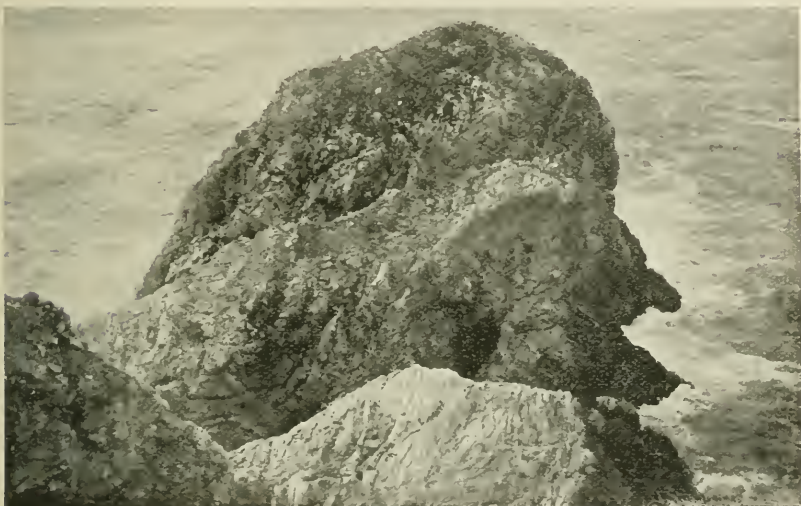


Oban

which surrounds **Loch Awe** and **Loch Eck**. The isles of Staffa and Iona, in the Hebrides, have been famous from very early times. **Staffa is noted for its Fingal's Cave**, and **Iona** bears an honoured name in the ancient history of Scotland. The wild Atlantic storms rage amid the ruins of its cathedral, which remains, as the **monument of an earlier civilisation**, a tribute to the intellectual religious people of former days. The cathedral presides over a wide extent of stormy seas with their scattered isles. The walls of the venerable building, with its Saxon and Gothic arches, and its stone crosses that mark the last resting-places of many mighty kings, form a strong contrast to the hovels of the fishermen, which stand upon the shore.

Cape Wrath, at the north-west extremity of Suther-

land, is a spot of sombre beauty. It is full of sad memories of shipwrecks, being a very dangerous place for vessels.



(Photo: Wilson, Aberdeen)

Cape Wrath

The Country of the Tweed

The Tweed Country is full of interest to those desirous of seeing the honoured spots of Scotland. Crowds are attracted annually to Roxburgh, famous for the ruins of a royal castle. On the banks of the Tweed, amidst sylvan surroundings, stands **Abbotsford**, the residence of Scotland's most famous poet and novelist. American tourists who are anxious to see the home and the library of the "Wizard of the North" are constant visitors to Abbotsford.

Lower down the river we come to the ruins of **Melrose Abbey** and **Dryburgh Abbey**. It was of the former that

Sir Walter Scott wrote the well-known couplet,

“If thou wouldst view
fair Melrose aright,
Go visit it by the
pale moonlight,”



The Ruins of Iona Cathedral

though at any time
the beautiful ruins

are well worth a visit. The tombs of the Douglas family, many members of which were buried in the abbey, recall much of Scotland's Border history. **Dryburgh**, a ruin overgrown with ivy, contains the tomb of Sir Walter Scott.



Abbotsford

The home of Sir Walter Scott

CHAPTER VIII

THE PEOPLE OF SCOTLAND

The Making of a Race

THE North of Britain is peopled by a mixed race. The country has been variously known at different periods as **Hibernia**, **Caledonia**, **Scotia** and **Scotland**, each name suggesting a new element in the people of the country. The first inhabitants of whom we have any record were called **Picts**, or **Caledonians**; these were joined by the **Scots from Ireland**, and, later, **Saxons**, **Angles** and **Britons** pushed northward, to be followed by **Danes** and **Northmen**. All these contributed to the population of this northern portion of Great Britain. While, generally speaking, all these various elements have in process of time become fused into one people, there are numerous instances of distinct traits, habits, customs and modes of life which indicate the origin of the people. For example, on the east coast we meet with people engaged in the fishing trade, decidedly akin to the Northmen, and others who give unmistakable evidence of Danish origin. The Orkneys, which were for centuries held by the Northmen, have naturally a strong Scandinavian element. The origin of the people is clearly indicated by their speech, their occupation and the names of their villages.

Climate and Character

Observations spread over a reasonably long period of time lead to the conclusion that the climate of a country exercises a power in determining the character of a people. We have already noticed a great similarity between the climate, surface and coast of Scotland and those of Scandinavia, and from these reasons alone we should consequently expect to find some marks of resemblance between the people of two countries, whose modes of life are very similar. The influence of the **Norwegian element in the language** would, however, seem to point to some other factors than those we have just mentioned, and history shows that there have been frequent inter-marriages between the people of Scotland and their Scandinavian invaders. The **physical resemblance** is very striking, and at the first glance it is seen that the **Scotsman is of the same type as the Norwegian.**

Characteristics of Lowlanders

The **Lowlander is a fine specimen of manhood**, being taller than his English neighbour, and of much stronger build. His features are regular, but he has the high cheek bone which is characteristic of his race. His eye is bright; his **intelligence is well developed**; he is **persevering in habit, prudent in action and thrifty** to an extreme degree. We see the results of these sterling qualities in the success with which the Scotsman pursues his calling of agriculture in a country offering many difficult obstacles. The unsym-

pathetic climate, hard rocky soil and the mountainous character of the soil surface make transit difficult. The land has been cultivated skilfully and profitably, and in a manner that redounds to the credit of the Lowlanders.

Education

Probably in no country in the world is there a more fervid **love of education for its own sake** than in Scotland, although here, as elsewhere, there are people who are keen on education for the sake of the material advantage that so often accompanies it. The ordinary artisan or agricultural worker is generally a reader and a thinker, and he frequently has aspirations for the wider culture which a university course makes possible. Fortunately for him, financial obstacles need not daunt him, for the poor worker finds a way open to him, the facilities for higher education being much greater in Scotland than south of the Cheviots.

The Highlanders

The **Highlanders have a well-deserved reputation for bravery**, loyalty and manliness, and on the field of battle the showily dressed clansmen, with their kilts and pipes, have always been conspicuous for courage, determination and sustaining power. Divided into numerous clans, in the old days they were frequently at enmity, and neighbours fought each other with deadly determination on all kinds of pretences. For various reasons people have been driven from the land north of

the Grampians, and as a result that part of the country has become an extensive shooting ground given over to sport for which it is famous. From this point of view, the northern part of the country presents a very marked contrast to the industrial beehive of the Lowlands.

Scotch Patriotism

The **love of country** is strongly developed in the Scot, though of necessity he has often to go from home to find suitable outlets for his intelligence and industry. His intense patriotism finds expression in many ways, and the great Scottish poet, Sir Walter Scott, in his **Lay of the Last Minstrel**, gave utterance to this national characteristic in the following beautiful and well-known lines.

MY NATIVE LAND

Breathes there the man with soul so dead,
Who never to himself hath said,
 " This is my own, my native land ! "
Whose heart hath ne'er within him burned,
As home his footsteps he hath turned,
 From wandering on a foreign strand !
If such there breathe, go, mark him well ;
For him no minstrel raptures swell ,
High though his titles, proud his name,
Boundless his wealth as wish can claim ;
Despite those titles, power, and pelf,
The wretch, centred all in self,
Living, shall forfeit fair renown,
And, doubly dying, shall go down
To the vile dust, from whence he sprung,
Unwept, unhonour'd, and unsung.

CHAPTER IX

WORTHY SONS OF SCOTLAND

Scotland's Roll of Fame

THE Scottish people are justly proud of the long list of famous **men who have played leading parts in the making of the history of our Empire**, of the **great scholars** who have enriched our literature, of the **engineers**, the **merchant princes** and the **financiers** who have so largely helped to open up commerce and industry in hitherto almost unknown countries. Many books of the size of this would be required to give anything like a full list of the Scottish heroes and men of note, but the following names will bring a few to our notice.

Sir Colin Campbell

Sir Colin Campbell, a general to whom Britain owes much of her power in India, was educated at Glasgow. He **served in Spain** under Sir John Moore and Wellington and **won distinction in the American War of 1812-15**. For his **services in China (1832) and in the Sikh War (1848)** he received the thanks of Parliament and the East India Company. He distinguished himself in the **Crimean War**, and on the outbreak of the **Indian Mutiny**, in 1857, he was hurriedly sent out as Commander-in chief.

Then it was that he effected the famous **relief of the siege of Lucknow**. Sir Colin succeeded in utterly defeating the enemy, and re-established the British power in India. For these services he was raised to the peerage as **Lord Clyde**, and was made Field Marshal.

“The Father of the Historical Novel”



Sir Walter Scott

Sir Walter Scott, the **greatest of Scottish novelists**, was the son of a writer to the signet in Edinburgh, and was born in the year 1771. He was educated for the law, and practised for several years as an advocate. After writing a number of ballads, in 1835 he wrote “**The Lay of the Last Minstrel**,” which was followed by “**Marmion**,” “**The Lady of the Lake**,” and other poems. In 1814 Scott published the novel

“**Waverley**”; in succeeding years appeared “**Ivanhoe**” and the other books which form the series known as “**The Waverley Novels**.” In 1820 Scott was made a baronet. Unfortunately, six years afterwards he was ruined by the bankruptcy of his publisher. With the **indomitable perseverance** for which the Scottish people are

renowned, Sir Walter spent his later years in an honourable and successful attempt to pay off the whole of his debts.

The Ploughboy-Poet

Robert Burns, the Scottish poet, lived in the eighteenth century, being born in 1759. He was the **son of a small farmer** in Ayrshire, and worked on the farm with his brothers. Nowhere can we find a better example of **real genius** than that which illumined the mind of the ploughman-poet. His first volume of poems attracted much attention, and Burns was invited to Edinburgh and made much of by literary people. He married, and became an excise officer as well as a farmer in Dumfriesshire. It is very sad to learn that such a wonderfully gifted man should have given way to irregular habits, which doubtless hastened his death. Burns's best-known poems are: "**The Cotter's Saturday Night**" and "**To Mary in Heaven.**"



Robert Burns

David Hume

David Hume, a noted historian, was born in Edinburgh in 1711. When yet quite a young man he left his native city for Bristol, and for a short time worked as a clerk in a merchant's office. Later he spent some years in France,

where he read deeply. The outcome of his study was the publication of essays and treatises dealing with political and philosophical subjects. These writings attracted some attention, but at first brought Hume little profit. He returned to his native city as a librarian, and later accompanied Earl Hertford on his embassy to Paris. After this he lived in London and was Under-Secretary



Lord Macaulay

of State for the Home Department. His **History of England** is his most noted work.

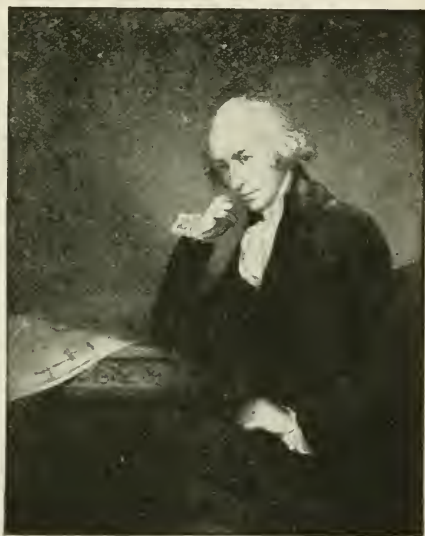
Lord Macaulay

Lord Macaulay, another great Scottish historian, essayist and poet, was born in 1800, and died in 1859. He was created a peer after holding the offices of Secretary for War and Paymaster-General. His chief works were the

“History of England from the Accession of James II,”
“Critical Essays” and “Lays of Ancient Rome.”

James Watt

James Watt, of engineering fame, was the son of a Greenock merchant. He became instrument-maker to Glasgow University. Watt perfected the science of working **engines by steam-power**, and succeeded in making engines of his own. He was a remarkably able man, and was constantly producing some new invention whereby his fellow men might benefit; among these may be named the **copying press**, for which he obtained a patent early in the nineteenth century.



(Photo: Emery Walker)

James Watt

James Nasmyth

James Nasmyth, **engineer and inventor**, was the son of Alexander Nasmyth, the founder of the Scottish School of landscape-painters. James Nasmyth came to live in Manchester, where he invented the **steam-hammer**, which was adopted by the Government

in 1843. Nasmyth was also the inventor of the **torpedo-ram**, and other triumphs of engineering skill.

Scotland's Great Philanthropist

Andrew Carnegie, Scotland's great philanthropist, is as proud of his nationality as the Scottish people are

of claiming him as their countryman. Early in life he went to America, where, by the exercise of those fine qualities for which the Scottish character is so well esteemed, he ultimately became the **Steel King**. After acquiring a huge fortune, he returned to Scotland, distributing yearly vast sums of money to help to improve and to make happier the lives of his fellow countrymen. He has **endowed the Scottish Universities** with a fund to enable poor and deserving students to obtain a uni-



(Photo: Macintyre, Dunfermline)

Andrew Carnegie

versity education. Mr. Carnegie does not, however, confine his gifts to his native land, for his charities are bestowed throughout Great Britain, and America owes much to his generosity.

PART II—IRELAND

CHAPTER X

A GENERAL VIEW OF IRELAND

The Names of Ireland

THE meaning of the name Ireland is obscure. We often hear the country spoken of as the **Western Isle** ; it is also known by the name **Erin**. Owing to its verdant pasture, which is due to the humid climate, Ireland is called by the appropriate name of **The Emerald Isle**, while on account of its relationship to the other members of the British Isles it is often referred to as the **Sister Isle**.

Geographical Situation

Ireland is not so well known as England and Scotland, because it is **less important from a commercial and industrial point of view**. Nor until recent years has it attracted people as a pleasure resort to anything like the same degree as Scotland has done. Ireland is about 120 miles from Liverpool, 64 miles from Holyhead in North Wales, and about 54 miles from Fishguard in the south-west of Wales. It is not the distance that has kept people from Ireland, but the fact that a rough sea has to be crossed.

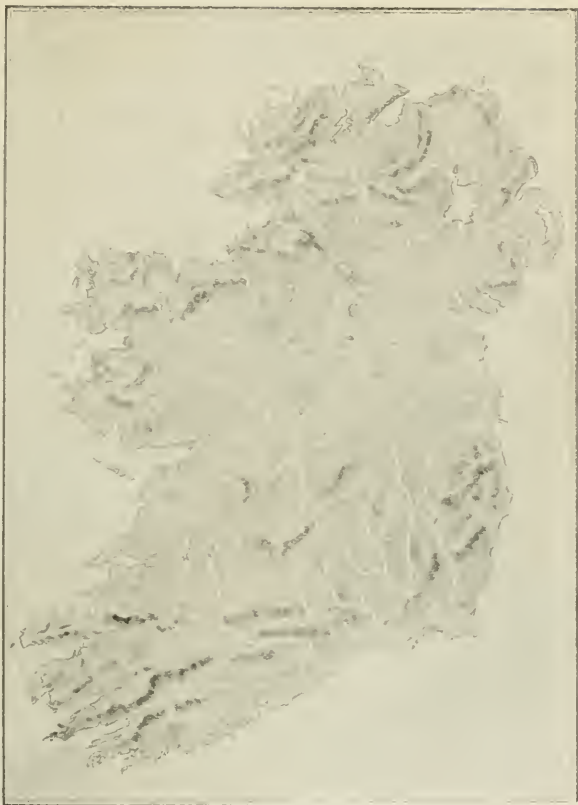


(Photo: Photochrom Co.)

Temple Arch. Horn Head, Co. Donegal

The West Coast of Ireland is rock-bound and deeply indented

In recent years, however, there has been a great **advance in the shipping facilities**, and excellent boats now cross the Irish Sea and St. George's Channel. The passage occupies but a short time, and the comfort of passengers is well provided for. Ireland, in consequence, is fast becoming a popular holiday centre.



Physical Relief Map of Ireland

Ireland, as we have already learnt, is an island lying to the west of Great Britain. As Ireland is an island it must have the sea on all sides. On the north, south and west there is the **Atlantic Ocean**, while on the north-east Ireland is separated from Scotland by the **North Channel**,

and on the east from England and Wales by the **Irish Sea** and **St. George's Channel**.

The Coasts and the Climate

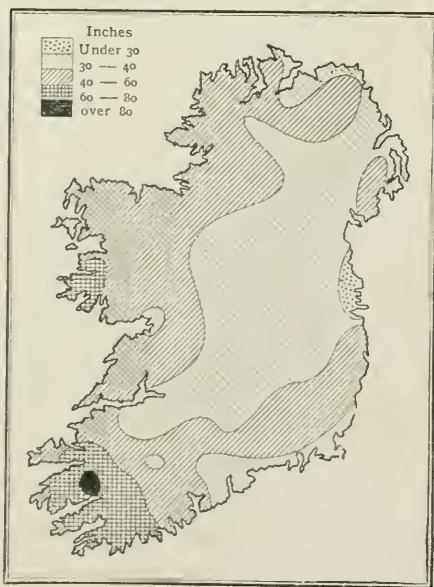
Ages ago Ireland formed **part of the same mainland as Great Britain**, and there is little doubt that Great Britain and Ireland were long ago part of the continent of Europe. The **western coast of Ireland is deeply indented**, and in this respect it resembles the western coasts of Scotland and Norway. It is subjected to the great force of the Atlantic Ocean, and its climate is affected by the moisture-laden winds from the west. The **east coast**, also like that of Scotland, **is much less broken** than the west, and consequently it has a more regular form. On the coast we have broad bays, sands and an occasional promontory.

As we have seen, a map is very helpful in estimating the climate of a country: the latitude, the nature of the currents, the passage of the winds over the ocean and the arrangement of the mountains all help to indicate the climate. We find that the **latitude of Ireland** is about $51\frac{1}{2}^{\circ}$ in the south, and about $55\frac{1}{2}^{\circ}$ in the north. The country, therefore, is farther south than Scotland, and from this fact we should expect, generally speaking, a milder climate than that experienced in the latter country; as a matter of fact, the climate of Ireland is warmer than that of the north of Britain. **The sea acts as an equaliser of climate**, and as Ireland is an island, it is subject to less extremes of temperature than other countries in the same latitude. The south-westerly winds are warmed by the

Gulf Stream and considerably modify the climate of Ireland, making it much milder than it would otherwise have been. Vegetation in the south and west is very much assisted by these warm winds, and is in consequence more luxuriant.

Disposition of the Mountains

The disposition of the mountains has an important bearing on the climate. A glance at the contour map shows that in this respect Ireland differs very considerably from England and Scotland. The general form of the surface of Ireland resembles a shallow basin, for **the mountains are arranged round the coast**, and the surface is sometimes roughly but conveniently compared with a saucer. The whole of the **central portion is a plain** having an elevation of not more than 250 feet above the level of the sea in any part. This arrangement of the mountains affects the rainfall, which averages about 40 inches annually, and though there is only one district with a rainfall of over 80 inches, as we find in several parts of Scotland, or in



Rainfall Map of Ireland

the hills of Cumberland, there are few parts so dry as the eastern counties of England.

The People

Although Ireland is a **little larger in area than Scotland**, yet it has a **slightly smaller population**. In each country there are about four and a half millions of people, a population which is less than that of London. The population of Ireland is **constantly decreasing through emigration**, for very many people leave Ireland every year for the United States and Canada.

DIVISIONS OF IRELAND: The Provinces

In very early days Ireland was divided into **Provinces**, each of which was under an over-lord and formed a small kingdom. These provinces still bear their ancient names. Nowadays they have no powers or privileges as provinces, but are convenient divisions, and enable us to speak of a large portion of the country by its special name. The four provinces are **Ulster** in the north, **Munster** in the south, **Leinster** in the east and **Connaught** in the west. The best way to impress the position of these provinces on the memory is to draw a map of Ireland, colouring each division differently.

These provinces are further divided into counties which bear their old Gaelic names. **Leinster has twelve counties; Ulster contains nine counties; Connaught includes five counties; and Munster has six counties**, making in all a total of thirty-two counties. **Ulster has the**

Religious Divisions

There is another way in which we can divide Ireland. The **north** is **distinctly Protestant in religion**, while the people in the **south, east and west** are mostly members of the **Roman Catholic Church**.

This division is a very important one in any country, and especially is this so in Ireland, where Protestants and Catholics have for many years very often regarded each other as enemies.



General Map of Ireland

CHAPTER XI

THE SURFACE OF IRELAND

Characteristics

THE surface of Ireland is very different from that of Great Britain. The interior of the country consists of a **central plain** or tableland, while the **mountains** for the most part take the form of **short ranges or groups near the coast**. In the central plain there are many lakes, which are fed by the streams that flow from the inner watersheds of the surrounding mountains. The plain is covered with bogs which yield a plentiful supply of peat, used in Ireland to so large an extent for fuel. The northern mountain

groups include the **Mourne Mountains** of **Antrim** and the **Donegal Mountains**. The highest peak is **Mount Errigal**, which, however, is only 2,500 feet high. The mountains of Antrim and Donegal are part of a big tableland or plateau



Pleaskin Head, Antrim

Compare with the picture on page 95

ending on the coast in bold cliffs or headlands. In their formation these mountains show clearly that they are a continuation of the Highlands of Scotland, granite occurring plentifully in both.

Rock Formation

Some further evidence in support of the geological theory that at one time Scotland and Ireland were joined



(Photo: McIsaac and Riddle, Oban)

Staffa, Scotland

Compare this with the picture on page 94, and notice how similar is the rock formation together is to be found in the similarity of rock formation along the northern coast. The **Giant's Causeway**, for instance, is strikingly like the coast of the island of Staffa off Scotland, both possessing remarkable basaltic columns, as also does **Rathlin Island**, lying off Antrim and near the

96 Scotland, Ireland and Canada

coast of Scotland. Rathlin is a remnant of an ancient bridge of lava, and the cliffs which bound it are formed of gigantic columns of basalt. Clearly this part of Ireland has in remote ages been subject to volcanic action.

Lough Neagh

In **Ulster**, about 15 miles west of **Belfast Lough**, we have the largest lake in Ireland, and, in fact, the largest lake in the British Isles. **Lough Neagh**, as it is called, has an area of about 150 square miles, but it is very shallow. It is drained by the river **Bann**, which is about 100 miles in length and empties itself into the estuary of **Lough Foyle**. About twelve streams flow into Lough Neagh, and the Bann is the only outlet. This river divides the counties of **Antrim** and **Londonderry**, and at its mouth is the port of **Coleraine**. The **River Foyle** is of importance from having the town of Londonderry at its mouth.

Lough Erne

In **Fermanagh** we come to **Lough Erne**—a lake studded with over 300 small tree-clad islands. It is drained by a river of the same name into **Donegal Bay**. These waters teem with salmon.

The River Shannon

The Central Tableland is very largely **boggy land** interspersed with stretches of rich green meadows, and it is from this verdant district that Ireland takes its name of Emerald Isle. There are many lakes in this area. **The Shannon**, the largest and most important river in Ireland,

flows in a south and south-westerly direction through this plain. The river has its source in what is known as the "**Shannon's Pot**" in the mountains to the west of **Cavan**.

The Shannon is a slow and stately stream, flowing through rich pasture land. Its basin is about as large as



Shannon's Pot

Where the River Shannon has its source

that of the Thames; very early in its course the river is lost in **Lough Allen**. It then flows onward as a sluggish stream for about 80 miles, and next passes through **Lough Ree** and, further south, **Lough Derg**. Passing through the gorge of **Killaloe** it flows on, and with a rapid fall reaches **Limerick**, at which place it becomes a tidal river. It has a **large estuary**, and after a course of about 254 miles empties itself into the Atlantic Ocean. Its **chief**



Lough Ree

tributary is the **Suck**, which drains a portion of **Roscommon**.

The Bogs of Ireland

A distinctive feature of this part of Ireland is the **peat-bogs** to which we have already referred. The Irish bogs are amongst the most extensive in Europe, for they cover an area of over 1,772,450 acres, or about one-twelfth of the whole island. They have an average thickness of about 25 feet, though in places they reach a depth of 40 feet. **Peat is a very poor substitute for coal for manufacturing purposes**, but it is **largely used as household fuel** by the great mass of the people.

Bogs are soft and moist, and in some cases they will not bear the weight of a man. They are formed from rotting water-plants, grasses, ferns and mosses, which have grown, died down and been reproduced on the surface for thousands of years in an area freely supplied with water.

The **Bog of Allen**, in King's County and County

Kildare, is the best known stretch of bogland. In area it is **larger than the county of Durham**.

The River Boyne

On the east coast the longest river is the **Boyne**, which, however, is only about 70 miles in length. This river rises in **King's County** and flows through **County Meath**, emptying itself into the **Irish Sea**. On the mouth of the **Boyne** stands the town of **Drogheda**.

The River Liffey

The **Liffey** flows through the counties of **Kildare** and **Dublin** and then enters the Irish Sea after a course of about 50 miles. **Dublin**, the capital, stands at the mouth of the Liffey.

The River Slaney

The **Slaney** differs from the rivers just noticed in having a direct southern course. It rises in **Wicklow**, flows through **Wexford**, and after a course of 60 miles enters Wexford Harbour.

The Mountains of South Ireland

The **mountains** in the south run east and west, and amongst them are to be found the most elevated mountains of Ireland—namely, those in the wild county of **Kerry**. These mountains form parallel chains running in the same direction as the deep and narrow bays of the rugged south-west coast. The chief mountains are **Macgillicuddy's Reeks** in Kerry, with **Car-**

rantuohill, 3,414 feet high, the highest peak in Ireland, and the **Knockmealdown Mountains**, between the counties of **Tipperary** and **Waterford**. These mountains are, however, not so high as the highest peaks of Scotland, nor even as Snowdon in North Wales. At the foot of Macgillicuddy's Reeks lie the world-famed **Lakes of Killarney**, whose beauties are described in the chapter on the Scenery of Ireland.

The Rivers of the South

For a portion of their courses, the rivers of this part of Ireland follow the same direction as the mountains. The river **Blackwater** rises in Macgillicuddy's Reeks and flows directly eastward through **County Cork** into **Youghal Harbour**. Parallel to the Blackwater we have the smaller rivers of **Bandon** and **Lee**. The estuary of the latter river forms the magnificent **Cork Harbour**, and the former flows into **Kinsale Harbour**. The **Barrow**, which flows directly south into **Waterford Harbour**, has two tributaries—the **Nore** and the **Suir**. The Barrow is navigable as far as **Athy**, where it is joined by the **Athy Canal**, a short branch of the **Grand Canal**. It thus provides a continuous navigable waterway between Waterford and Dublin.

The Galtee Mountains

To the north of the Knockmealdown Mountains, which only reach a height of about 2,600 feet, we have the **Galtee Mountains** in **Tipperary**, the highest point of which is **Galteemore**, over 3,000 feet high. Still

farther north, in **King's County** and **Tipperary**, are the **Slieve Bloom** mountains, which occupy a central position among the Irish hills.

The Mountains of Connaught in the West

The mountains in the west include the **Nephin Beg** mountains in **County Mayo** and the **Connemara**



A View of Mountains and Lakes, Connemara

mountains of **Galway**. At the western end we have a group of heights with the strange name of "**Twelve Pins**." The mountains of Connemara are not so beautiful as those of Wicklow, but their scenery is wilder. They are surrounded by **Galway Bay**, the **Atlantic Ocean**, **Clew Bay** and **Loughs Corrib** and **Mask**.



The Meeting of the Waters, Killarney

Where the waters of the Middle and Lower Lakes meet and run to join those of the Upper Lake

CHAPTER XII

THE SCENERY OF IRELAND

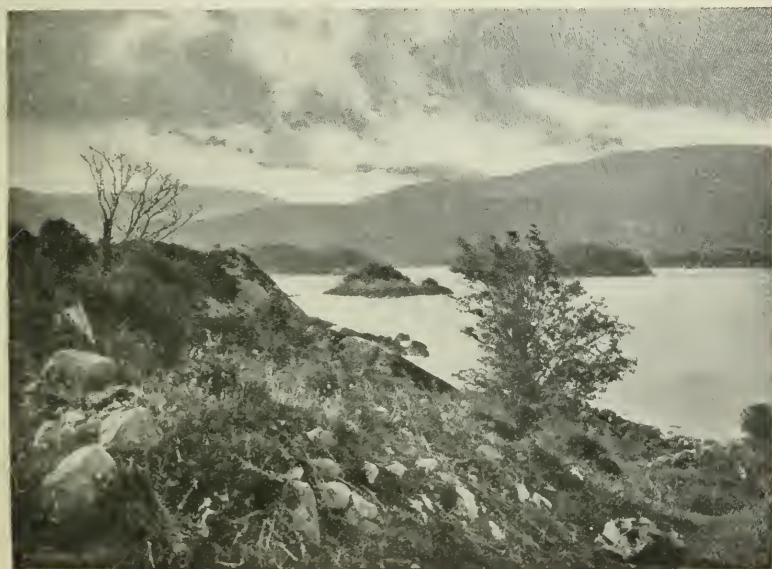
The Lakes of Killarney

As we have seen, the bogs of Ireland occupy about one-twelfth of its surface. In the greatest contrast to them, we find in the south-west scenery of such peerless grandeur as to be almost beyond description. The **County of Kerry** contains some of the finest and most picturesque views in the island. The **Lakes of Killarney** rank amongst the most beautiful places of the world.

They are situated in the midst of majestic and lovely mountains, whose ragged and rocky sides are clothed with rich and varied growth. This wealth and richness of vegetation is owing to the warm south-westerly winds which prevail in this part of the Emerald Isle.

The lakes are dotted here and there with tiny islets covered with trees, while foaming cataracts add to the grandeur of the scene.

The Lakes of Killarney are three in number, and are connected with one another. **Upper Lake** is two and a half miles long and half a mile broad, the **Middle Lake**,



The Upper Lake, Killarney

The lake is dotted with small shrub-covered islands

called **Torc Lake** and **Muckcross Lake**, is two miles long, while the **Lower Lake**, or **Lough Leane**, is five miles in length and three miles in breadth.

Near one end of the Lower Lake stands the town of **Killarney**, which has become a centre for the thousands of tourists who annually visit the lakes and the district around the shores of **Dingle Bay** and **Kenmare River**.

The **Gap of Dunloe**, a mountain pass four miles long, separates the **Purple Mountain** and **Macgillicuddy's Reeks**, which tower perpendicularly to a very great height. One writer says: "We enter the Gap—a scene rarely paralleled for wild grandeur and stern magnificence." The Gap runs parallel to the Lakes of Killarney. **Carrantuohill** (3,414 feet) and **Mangerton** (2,756 feet) are heights much favoured by those people who are fond of hill-climbing.

Coast Scenery of Cork

The **County of Cork** has very fine coast scenery, and the **City of Cork**, the capital of Munster, is very pleasantly situated on the river Lee, the **estuary of which** forms the magnificent harbour of Cork. Much of the city has been built on an island, which is connected with the mainland by means of six bridges. It possesses two cathedrals and two fine promenades lined with trees.

Queenstown

Within half an hour's railway journey from Cork lies the spacious harbour of **Queenstown**, with its islands.

The harbour is so large that it could easily hold all the vessels of the British Navy. Queenstown is the great place of call for American liners, and the mails and passengers are transferred from the steamers to a tender at the mouth of the harbour. The town rises in terraces, and from its highest point beautiful views are obtained of the harbour and of the opposite country. The climate of Queenstown is wonderfully mild, and ice and snow are rarely seen.

The Blarney Stone

Blarney Castle, five miles from Cork, is famous for the **Blarney Stone**. Many are the people who, in jest or



(Photo: W. Lawrence, Dublin)

Kissing the Blarney Stone

earnest, visit the old castle, just to be able to say they have kissed the stone, of which it is said, "Whoever kisses never misses to grow eloquent."

Youghal

On the **Waterford** border of County Cork nestles the quaint old town of **Youghal**, whose streets rise one above the other on the side of a hill. From the top charming views may be obtained. In the year 1588 Sir Walter Raleigh was the chief magistrate of Youghal, and his house is still preserved with great care. It was in the garden of this house (Myrtle Grove) that Raleigh planted the first potatoes grown in Ireland, and there Edmund



Sir Walter Raleigh's House at Youghal

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Spenser wrote a part of his great poem "**The Faerie Queene.**"

Glandore

Glandore has a beautiful harbour, whose water is of the deep blue rarely seen around our coast. It is said to resemble the lovely Lake Como in Italy.

Valentia Island

Valentia Island, about seven miles long and three miles broad, is noted for its fine cliff scenery. It also possesses several large natural caves. In fine weather these caves may be entered in a boat for a distance of 100 yards. The human voice raised in there sounds as though it came through a speaking trumpet. The cliffs of the island are very lofty, in one spot rising to the height of 600 feet.

Wicklow

Owing to its nearness to Dublin, there is no part of Ireland more frequented than the mountain regions of **Wicklow**. It is certainly one of the most beautiful districts. It has lakes and cascades, and bold headlands overhang the blue waters of the sea. No spot in Britain is more lovely than the **Vale of Avoca**. It was the junction of the Avonmore and the Avonbeg which inspired Thomas Moore to write the well-known ballad.

"THE MEETING OF THE WATERS"

There is not in the wide world a valley so sweet
As that vale in whose bosom the bright waters meet ;

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Oh ! the last rays of feeling and life must depart
Ere the bloom of that valley shall fade from my heart.

Yet it *was* not that Nature had shed o'er the scene
Her purest of crystal and brightest of green ;
'Twas *not* her soft magic of streamlet or hill,
Oh, no ! it was something more exquisite still.

'Twas that friends, the belov'd of my bosom, were near,
Who made each dear scene of enchantment more dear,
And who felt how the best charms of Nature improve
When we see them reflected from looks that we love.

Sweet vale of Avoca ! how calm could I rest
In thy bosom of shade, with the friends I love best,
Where the storms that we feel in this cold world should cease,
And our hearts, like thy waters, be mingled in peace.

The **Vale of Shanganagh**, which nestles in a sheltered nook of the Wicklow Hills, is a celebrated beauty spot. The beauties of Wicklow and its historical associations have often been praised in song and described in glowing prose by famous writers. Its wooded glens, its stately mountains, and its fair pastures have gained for it the name of "**The Garden of Ireland.**"

Connemara

Far wilder, but no less beautiful, than the Wicklow mountains are the high lands of **Connemara**. They occupy a portion of the almost insular region surrounded by **Galway Bay, Clew Bay** and **Loughs Mask and Corrib**. Besides the mountains the Connemara district contains many bogs and lakes.

Lough Erne

Turning our attention farther northward we are attracted by the beauty of **Lough Erne**, in the **County of Fermanagh**. The lake is really made up of a lower and upper lake. The **River Erne** issues from Lough Gowna in County Cavan, and, flowing north, merges into Lough Erne. Passing through the two portions of the beautiful lake, the river issues forth to continue its course to Donegal Bay, where it empties itself. The shores of the lake provide many interesting spots, and its surface is studded with numbers of beautifully wooded islands.

Enniskillen

An ancient stronghold, recalling the romantic past, **Enniskillen** stands in a beautiful position, being almost encircled by the River Erne. **Devinish** is an island in Lough Erne noted for the remains of an abbey which was built in the sixth century, besides other buildings of rare design.

Giant's Causeway

The famous **Giant's Causeway** off the coast of Antrim attracts many visitors to the north-east of Ireland. The Causeway is a huge pavement formed by the tops of about 40,000 columns of basalt. Their heights range from a few inches to over 100 feet. The Giant's Causeway is widely known as a great natural curiosity. It is incessantly washed by the waves of the sea. There is a legend that it is the remnant of a road which

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formerly led into Scotland, but such a road could never have been formed by human hands. It is interesting to notice that the **North Channel**, which separates Ireland from Scotland, has a width of only 14 miles.

Wonderful caves, with their pavement of sea and walls of basalt, form part of the attraction of the Giant's Causeway, the most beautiful being one called Portcoon, which is 450 feet long and 40 feet in height, and can be explored for a good distance in a boat. The walls of the cave slope like the inside



(Photo: A. R. Hogg, Belfast)

The Giant's Causeway

There are 40,000 columns of basalt in this wonderful pavement

The Scenery of Ireland

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walls of a Gothic cathedral. **The County of Antrim** has many strange formations along its coast.

Kilkee

Kilkee is one of the most delightful watering-places. In position and appearance it much resembles Weymouth. The Atlantic is seen in its grandeur from the cliffs along this coast, and the seascapes to be viewed here are very fine.

On a small island in the Shannon are the ruins of an ancient monastery and the remains of a very old church. Near Killaloe was the site of the famous Palace of Kincara, where the ancient kings of Munster resided.

Limerick

Historically there is no more interesting place in Ireland than the city of **Limerick**. Before the Norman Conquest the Danes made it their capital. It is sometimes spoken of as "**The City of Sieges**," which fact plainly tells us that warfare and strife have played a large part in the doings of this ancient city.

The Caves of Mitchelstown

A group of wonderful caverns is to be found near Mallow, a short distance from the **Blackwater**; they are called the **Caves of Mitchelstown**. They were discovered by a farmer while cutting a quarry in the limestone hill which separates the Galtee Mountains from the Knockmealdown Mountains. They consist of a number of caverns and passages, whose walls and ceilings

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are made of glittering spars of fantastic shapes and varied colours. When the caves are lighted up they appear as a perfect fairyland, so gorgeous is the effect of light, colour and form. Such fancy names as "The House of Lords" and "The House of Commons" have been given to distinguish them. The **Kingston Gallery** is the most noted one. Its length is 175 feet and its breadth 7 feet.



Beautiful Boyne Water

(Photo: G. H. Orpen)

The Valley of the Boyne

The **Valley of the Boyne**, in **Louth** and **Meath**, is another picturesque district. It is not famous for its beautiful scenery alone, for its history shows that the Boyne valley has occupied a large part in the story of

Ireland from the advent of Christianity up to recent times. Cairns and other remains show that man was busy here even thousands of years before the time of written record.

The Hall of Tara

Along the banks of the Boyne we come to the Hall of Tara, "the capital, the palace, and the justice-seat of



(Photo: A. R. Hogg, Belfast)

Tara

Where live memories of ancient Ireland

the first over-kings of Ireland." The Hall of Tara takes us back in thought to the far distant past. When Rome was not, and Athens was not, there was a palace at Tara where for 1,200 years before the birth of our Lord, and until about A.D. 505, the rulers of Ireland held court. But more than this, Tara was the seat of government, where legislators made laws, where judges administered them. The history of Tara is, in fact, the history of Ireland of long ago, and Thomas Moore, an Irishman who loved his country and revelled in her traditions, felt the inspiration of the poet as he wrote his thrilling ballad on "The harp that once through Tara's halls."

The harp that once through Tara's halls
The soul of music shed
Now hangs as mute on Tara's walls
As if that soul were fled.
So sleeps the pride of former days,
So glory's thrill is o'er ;
And hearts that once beat high for praise
Now feel that pulse no more.

No more to chiefs and ladies bright
The harp of Tara swells :
The chord alone that breaks the night
Its tale of ruin tells :
Thus freedom now so seldom wakes,
The only throb she gives
Is when some heart indignant breaks,
To show that still she lives.

St. Patrick, the patron saint of Ireland, trod the Boyne Valley, and William of Orange fought against



(Photo. A. R. Hogg, Belfast)

Drogheda

King James II and won a famous battle in this district. On one side of the river is a fine obelisk to show where the Orange forces crossed the river, while lower down is the wooded elevation known as "King James's Hill," where the deposed king's soldiers were posted. **Drogheda** seems to have been the centre of these historical doings. Here several important parliaments were held, one of which met in Henry VII's reign. In the year 1649 the town was stormed, and almost the whole of the inhabitants were put to the sword by Oliver Cromwell.

Glengariff

Few landscapes can compare with the **Valley of Glengariff** on the shore of **Bantry Bay**, or rather on a beautiful sea-water lake which opens into Bantry Bay. It is surrounded by mountains of wonderful and varied

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shapes which are covered with the richest foliage. The bay possesses some interesting sea-caves, and the pretty harbour of **Adrigole** is guarded by Hungry Mountain with its fine cascade; while near by the **Sugar Loaf Mountain** rises high and grand in its wild beauty.

The "**Rough Glen**," as Glengariff is locally called, is a deep valley about six miles in length and a quarter of a mile in breadth. Its **luxuriant foliage includes many American and tropical plants**. Being sheltered by high mountains from the north and east winds, and warmed by the waters of the Gulf Stream on the southwest, Glengariff has become a famous resort for those in search of health. There are **excellent salmon and trout** to be caught in the surrounding rivers and lakes, while in **Bantry Bay** hake, bass, bream, mullet, mackerel, sole and plaice are fairly plentiful.

The beautiful woods abound in wild animal life: martens, hares and otters thrive each in its favourite haunts, and the wild duck, the grebe, the sea snipe, the curlew and the cormorant add their charm to the landscape, and breed in safety on the rocky islets.

Loughs Ree and Corrib

Loughs Ree and Corrib each provides many points of interest along their shores. The latter lake affords beautiful views of many peaks of the high lands of Connaught. It is said that Lough Corrib contains an island for every day of the year. Ruins of early churches are to be found on some of them. Indeed, many remains

of ancient churches and monasteries are found dotted about this part of the country. There are the remains of seven churches dating from the seventh century, and in the neighbourhood are two sculptured crosses of ancient workmanship, one being 13 feet high. There is no doubt that in days long past a great school of learn-



Antiquities at Clonmacnois

ing existed at **Clonmacnois**. Indeed, there was a time when Ireland was known throughout the world as the island of saints and scholars.

Portrush

Portrush is a favourite watering-place near the Giant's Causeway, and around here is a stretch of the fine coast scenery for which the shores of Antrim are remarkable.



The Bridge at Killaloe

Killaloe

County Clare is noted for the beauty of its river and lake scenery. **Killaloe**, on the eastern side of the county and at the entrance of **Lough Derg**, is a very picturesque old town, and possesses a cathedral which was built in the eleventh century. Killaloe also has an ancient bridge of thirteen arches, which crosses the "lordly Shannon." **Ennis**, the capital of the county, also possesses a beautiful bridge which spans the **River Fergus**.

The Emerald Isle holds so many spots of interest, and so many picturesque districts, that it is not possible to view them all, as it were, in the short space of this book; but we have read enough to see that Ireland is not merely a country of wilds and wastes, and that its scenery is wonderful in its variety, and famed alike for its beauty and historical interest.

CHAPTER XIII

THE INDUSTRIES OF IRELAND

Sources of Wealth

WHEN studying the geography of Scotland we learned that the industries of the country are dependent on the natural conditions as well as on the people. This is equally so in the case of Ireland. Unfortunately Ireland has **very few natural sources of wealth**. The **coal measures** have been worked only in a few basins, and the **scarcity of good steam coal** accounts for the fact that the chief manufacturing centres lie mainly on the east coast within easy reach of the English, Welsh and Scotch coalfields. Iron mines are worked in the county of Antrim, though this valuable metal is not produced to any great extent.

Though the **mineral wealth is very small** it is interesting to learn that there is evidence of **gold** having formerly been found in **Wicklow and Donegal**, while the **black marble of Galway and Kilkenny**, the **red marble of County Cork** and the pretty **green marble of Connemara** are all useful for decoration. There are some **granite quarries at Newry and in Galway**. There is an **abundance of peat** or turf, and this is used as the chief fuel and helps to make up for the scarcity

of coal. From the peat we obtain tar, oil, alcohol and ammonium salts.

Knowing how the small population is continually diminishing through emigration, we cannot expect great industrial activity, because people only leave a country in large numbers when the means of livelihood are insufficient. We can always safely regard heavy emigration

as a sign of failing prosperity, and this is the case in Ireland.



(Photo: Welch, Belfast)

A Flax Bruiser

Agriculture

The poverty of coal supplies makes it difficult to engage in manufactures, and the general absence of the useful metals like iron is

another great drawback in this direction. Naturally, then, the people have to turn to the **soil as the chief means of existence**. The soil, however, is often thin and stony, and the climate is wet. The farmer has little encouragement, and as a result the cultivation of the crops has unfortunately been much neglected of late years. **Agriculture generally is in a very backward state**, and the best methods

of farming are not followed. Want of money is the chief difficulty, for the farmers cannot afford to get the best machines and implements necessary for profitable farming. **Oats and potatoes** are the main crops except in Ulster, where **flax** is cultivated. This is used in the manufacture of linen goods. In a lesser degree **turnips, wheat and barley** are grown.

Cattle-farming

Ireland is richer in cattle than is Britain, though much loss has resulted from cattle plagues. Large quantities of cattle are exported. **Pigs** are

very largely produced for export, and good **horses** are bred for the English market. **Sheep** are largely reared, and these yield wool for the **Donegal homespuns**. Ireland formerly had a big trade in woollen manufactures, but this industry was crippled by an Act of William III, which imposed heavy import duties to keep the Irish woollens out of England, to guard against



(Photo: Welch, Belfast)

Donegal Home Spinning

competition with English goods. **Dairy farming is an important occupation.** Butter, cheese and bacon are exported from the south and south-west of Ireland, and find a ready market in England.

Fisheries

The fisheries of Ireland are valuable, but the lack of means for quickly transporting the fish to the markets of England and Scotland while it is fresh prevents Ireland from reaping the fullest benefits from her fisheries. Mackerel, herring and cod are plentiful.

Textile Manufactures, etc.

Linen-weaving in Ulster is the most notable industry of Ireland. Irish linen is considered excellent on account of its whiteness and quality. Home-grown **flax** is not sufficient to meet the demand, and flax is therefore imported from Russia, Germany and Holland. **Belfast is the centre of the linen industry**, and is said to surpass all other towns of the world in the quality and quantity of its linen goods. **Armagh and Londonderry are also engaged in the linen trade, especially the making of fine linen; shirt-making** is a special industry of Londonderry.

Shipbuilding is an important industry of Ireland, and the shipbuilding yards of Belfast are known all over the world. Its position near Scotland, whence it gets its coal, and its position as a port, are very helpful in this work. Cotton goods are also made at Belfast, and there

are important machine works in the town. **Lace and poplin goods are manufactured at Dublin.** Another industry is **brewing and distilling**, carried on in Dublin and in Cork. In Dublin, on the banks of the Liffey, are immense storages for Dublin stout, which is shipped to ports throughout the world.

There are lesser industries which find light work for the scattered peasants. Balbriggan, a little north of Dublin, is noted for its manufacture of hosiery, and as we shall see in the chapter on towns. Limerick makes famous lace.

Helping Irish Industries

Various means have been taken to improve the



Industrial Map of Ireland

industrial prosperity of Ireland. The new department of Agriculture and Technical Instruction has already done much useful and needed work to extend trade as well as to improve methods of working. The spread of general education will tend to make the workers more intelligent and to improve the industrial outlook. **The construction of light railways is very badly needed** in Ireland. It is no use having fisheries, for example, unless the fish can be quickly carried to the large towns. Farm produce, too, must be got to the ports quickly and exported whilst it is fresh. The great increase in the service of steamers between Great Britain and Ireland is a good sign.

Peasant Proprietors

Within the last fifty years about **6,000 peasant proprietors have been created in Ireland**, and this must have a good effect on the farming, because the peasant farmer lives on the land and is naturally interested in getting the most out of it. **The chief need of Ireland, however, is capital** with which to develop the natural resources. Increased means would help to banish poverty and improve the condition of the people.

Ireland's Great Customer

Irish trade is chiefly with Great Britain. Considerable trade is carried on between the ports of Dublin, Belfast and Cork on the Irish side, and Liverpool and Bristol in England, and Glasgow in Scotland.

CHAPTER XIV

THE TOWNS OF IRELAND

Dublin

WE will now turn our thoughts to the chief towns of Ireland, and see what we can learn of their position, their chief attractions and the various ways in which the inhabitants obtain a living. The first city that naturally comes under our notice is **Dublin**, the capital of Ireland. It **stands on a fine bay** on the east coast, at the mouth of the Liffey. It has a **good harbour** and carries on a **great export trade**, chiefly in live cattle, which are taken to Liverpool and Holyhead. It also exports dairy produce.

Dublin has the old University known as **Trinity College**, and there is also a recently formed one called the **National University of Ireland**.

The city has **few manufactures**, the chief being the distilling of **whisky**, the brewing of Dublin **stout** and the making of **poplin**. This is a handsome cloth made of a mixture of silk and worsted, which is much used for ladies' dresses. The town has also large **chemical works**. The population of Dublin is 309,000.

There are many fine buildings in Dublin, amongst them being the chief **Law Courts** of the country. The



Chapel Royal, Dublin Castle

(Photo: Jennings)

Custom House is also a very imposing building, **Dublin Castle** is the residence of the Lord Lieutenant of Ireland, the nobleman who acts as deputy for the King. The castle is situated in the famous **Phoenix Park**, a magnificent open space with a circumference of seven miles. In the park stands a lofty marble column to commemorate the victories of the great Irish hero the Duke of Wellington. Here also are the **Zoological Gardens** and an **aquarium**.

We must not omit to notice the **Bank of Ireland**, facing College Green. This building was once the Irish

House of Parliament, and is **one of the finest structures in Dublin.**

The citizens of Dublin are justly proud of their principal thoroughfare, **Sackville** or **O'Connell Street**. Though it does not measure quite half a mile in length, owing to its great width it has the appearance of being a square. It has lofty buildings and a line of monuments, including **Nelson's Pillar** and the memorial to Daniel O'Connell.

Dublin possesses a **National Gallery**, which has a fine collection of paintings and statuary, and a Science and Art Museum. It also has **two cathedrals: Christ Church**, founded in the year 1038 by the King of



Customs House and Quay, Dublin

the Danes in Dublin; and **St. Patrick's Cathedral**, the national cathedral of the Church of Ireland. The latter church was founded by St. Patrick himself, but the present building was erected in the thirteenth century.

Kingstown

Kingstown, a short distance from Dublin, is a packet station for Holyhead. It has an artificial harbour which was made to save time for mails and passengers. Kingstown is a watering-place as well as a port, and has a population of about 20,000.

Belfast

Although not the chief city, Belfast, on Belfast Lough, takes **first place in trade and manufacture**. It is one of the best ports in the kingdom and also has famous **shipbuilding yards**. Many of the finest ships afloat have been built at Belfast. Much trade is done with Liverpool and Glasgow, and as we saw in the chapter on Irish Industries, Belfast is famous for its linen manufactures. There are also **iron works, cotton factories and glass works**. Some of the flax used in making linen is grown in the district, but large quantities are also imported from Russia, Germany and France. Belfast has one of the largest tobacco factories in the world, and her extensive rope-walks give employment to many people. The population of this city, the commercial capital of the country, is about 385,000. It has many handsome buildings, colleges and gardens. The



A Belfast Bleaching Green

Albert Memorial is the most noticeable monument: it suitably stands in Queen Street. The new **City Hall** is one of the most imposing public buildings in the British Isles. It cost over a quarter of a million pounds. We must notice that the **new Technical Institute** is one of the finest in Europe.

Cork

Cork, on the river Lee, has a **fine harbour** and carries on a **large foreign trade**. The **distilling of whisky** is a staple industry. Large quantities of dairy produce from the surrounding country are sent to the port for exportation, along with the provisions and cattle.

*(Photo : W. Lawrence, Dublin)*

Queenstown

Linen, woollen goods and leather are also manufactured in the city. Cork resembles Dublin in having a separate packet station.

Queenstown

American mail and passenger ships going to Liverpool call at Queenstown, which possesses a very large harbour. Queenstown, once known as the Cove of Cork, occupies most of the southern shore of Great Island. It was named Queenstown in honour of Queen Victoria's visit in 1849. It has a naval dockyard and is strongly fortified.

Limerick

There is no more interesting city in Ireland than that of Limerick, which holds a splendid position on both

banks of the broad river Shannon. The beautiful and well-known **Limerick lace** is made here, and the **manufacture of gloves** is another important industry. The city has also a very **considerable trade in the export of dairy produce and cattle**. Indeed, we may say that it has become a very important centre for creameries, and produces butter of the highest quality. A large quantity of condensed milk also comes from Limerick. The Castle at Limerick is in a fine old ruin, with a massive gateway and drum towers.

Waterford

Waterford, in the south, standing on the river Suir, is a prosperous port. After collecting the provisions and dairy produce from that most fertile valley known as "**The Golden Vale**," it exports those goods, as well as cattle and sheep, to the south of Wales and England.



The Castle, Limerick

*(Photo : Poole & Co., Waterford)*

Waterford

Its fine quays are hives of industry. Its population is about 28,000. Waterford, like Dublin and Cork, has two cathedrals and is a good type of an Irish town. It was founded by the Danes in the ninth century. **Reginald's Tower** is a memorial of the days when the Northmen held power in this district.

Galway

Galway, on Galway Bay, at the mouth of the river Corrib, has a population of about 14,000. Its **commerce is considerable**, as it is the chief port on this coast and the largest town in Connaught. Fishing is largely carried on. It is a remarkable fact that salmon can be caught within the area of the town itself. The **chief exports are dairy produce, fish and marble.**

During the Middle Ages Galway carried on much trade with Spain, and therefore the town became largely Spanish in its style, and many of the houses bear a resemblance to Spanish buildings. Of late great improvements have been made in the buildings and shops in Galway. It boasts a good college, known as **Queen's College**.

Wexford

Wexford overlooks the estuary of the river Slaney and Wexford Haven. It is **a port for provision goods**, and but for the bar at the river mouth it might have become a great shipping centre. It is a quaint old town of Danish origin, and its history tells stories of sad sieges.

Drogheda

A place which was once of note in Irish history is the small port of **Drogheda**, situated on the river Boyne several miles from the spot where it enters the Irish Sea. We have already referred to its historical associations. Its **manufactures** are **linen** and **cotton**. There is good communication between the town and Liverpool, and a daily service with Holyhead.

Londonderry

In the north of Ireland is the old town of Londonderry, on the Foyle, just where the river enters the shallow Lough Foyle. It is a very thriving town, with **linen factories**, **flour mills** and **shipbuilding** yards, and it has also a **busy seaport**. Many years ago the

*(Photo: A. Ayton, Londonderry)*

Londonderry

place was called Derry, but as it came to be largely owned by London merchants, its name was changed to Londonderry.

The town underwent a great siege against the forces of James II. The citizens held out bravely for William of Orange, under the leadership of a clergyman named Walker, and there is a fine column in the town erected to his memory. Londonderry is also a **place of call for Atlantic steamers**, although, as it cannot be reached by the largest vessels, some steamers call at Moville, below the shallows on the west of the Lough. In this way Moville in the north resembles Queenstown in the south of the country.

Some Other Towns

Kilkenny is a moderate-sized town on the Nore. It is a fact which should be noticed that **Ireland's largest towns lie along her coast.** Kilkenny ranks first in size among the few inland towns of the country. It has a famous **Round Tower**, and on a high rock is a castle built by Strongbow.

Wicklow is another town which owes its name to the Danes. It lies on a small creek between Dublin Bay and Wexford Harbour, and is sheltered by Wicklow Head. It is **noted as the port** which sends away the lead and iron pyrites obtained from the mountains of the district around.

A little farther south on the coast is **Arklow**, on the Avoca river, in County Wicklow. It is a **centre of the fishing industry**, and oyster dredging is carried on here. Messrs. Kynoch's works are in this town, where are made the terrible **explosives**, lyddite, cordite and nitro-glycerine.

Tralee, the chief town of Kerry, is a somewhat busy town, facing the broad Atlantic Ocean. It has some manufactures of woollen goods, and the Tralee tweeds are excellent.

Newbridge, in County Kildare, is a rather **important military station**; and on the border of the same county stands **Maynooth**, which is known amongst Roman Catholics as possessing one of their most famous colleges. **The Curragh**, though not a town, is an **important**

military camp. **Youghal** is an **ancient port** standing on the coast of Cork at the mouth of the Blackwater. It has valuable **salmon fisheries.**

Kilrush is beautifully situated on the river Shannon. It is an interesting **watering-place**, and has also thriving flour- and cloth-mills.

Armagh, in the county of the same name, is the ecclesiastical capital of Ireland. It has both Roman Catholic and Protestant Archbishoprics.

Bray, on the east coast, and not far from Kingstown, is a quaint old town, and once was a busy and prosperous market centre with a fishing industry. Now it has become an attractive **watering-place.**

Lying in a valley in County Down, and overlooked by the Carlingford Mountains, is **Newry**, the capital of South Down. It is a thriving **river-port** situated on the Newry Canal. Passenger steamers run regularly between its harbour and Liverpool, and Ardrossan in Scotland. **Athlone** is the chief **military station** in the west of Ireland. It has an excellent position on the Shannon, near Lough Ree.

Clonmel, on the Suir, in Tipperary, is a town of some importance. **Enniskillen**, in Fermanagh, has **linen manufactures.** **Kinsale**, on Kinsale harbour, is the centre of **important fisheries**, and also a favourite watering-place, and **Annalong** is another fishing centre. From this town granite from the Mourne quarries is exported in large quantities.

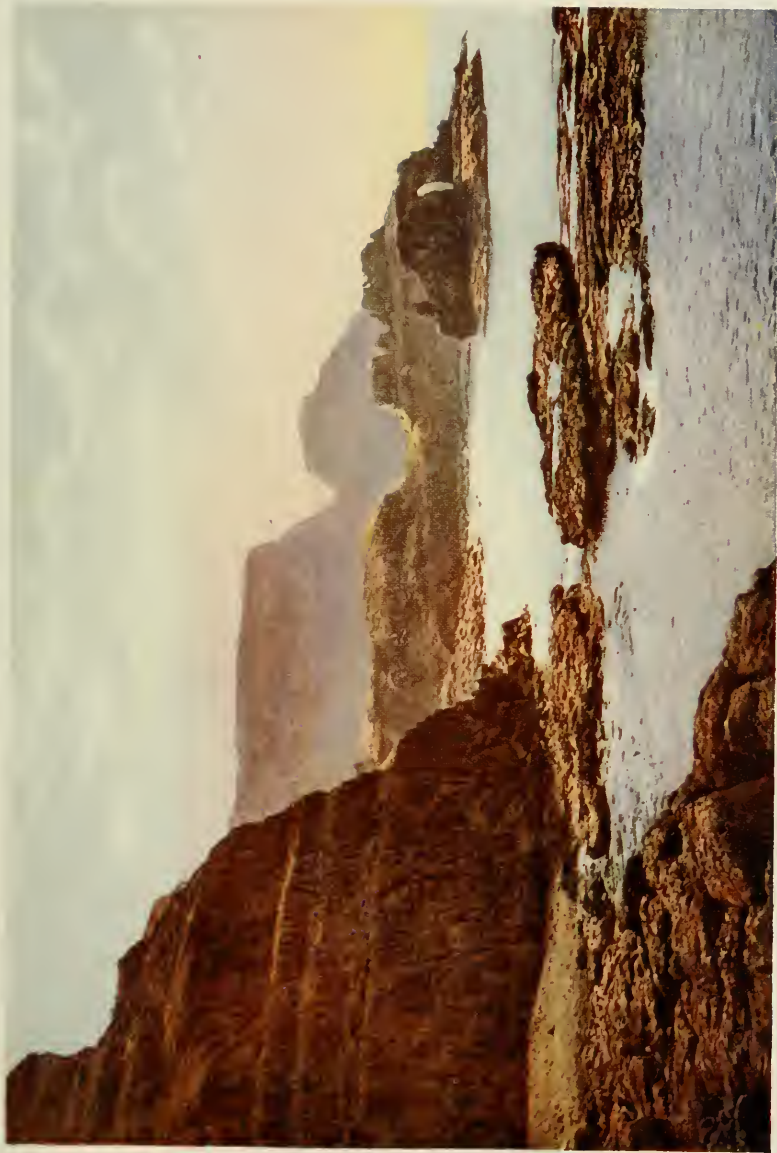


Photo: Photochrom Co.)

Giant's Causeway

See page 109

CHAPTER XV

THE PEOPLE OF IRELAND

The Making of a People

THE earliest people of Ireland, of whom we have a distinct record, were mainly of **Celtic origin**, though these found inhabitants in the country. The Irish of to-day are therefore akin to the Highland Scotch and the Welsh, all three having common ancestors in the Celts who came originally from Central Asia. The **Irish nationality** is still preserved, for the native language is spoken to-day in the central and western districts. The language is known as **Erse**, and though it is not spoken to the same extent as Welsh is in Wales, yet efforts are being made to revive it and to popularise its use.

Place Names

In the geographical place names we see the influence of the Erse language. We see by the map that the mountains are called **Slieve**, as in **Slieve Donard**; **Knock**, as in **Knockmealdown** mountains. Hills, mounds and rocks are known as **Duns**, **Garricks** (as in **Garrick-a-Rede**), **Croghans**, **Cloghs** and **Kens**; a watercourse has the name **Anagh** or **Ana**, while towns are known by the word **Kill**, as in **Killaloe**, **Kilkenny**.

Invaders

At different times there have been incursions of other people; thus we have evidence of an early **Spanish invasion**, especially in **Galway** and **Kinsale**. The **Danes or Northmen** also invaded the country, becoming masters of Dublin. The place-names are an indication of the people who lived in the various towns. The largest bodies of invaders naturally came from England, Scotland and Wales, arriving during the latter half of the twelfth century.

The English had to fight their way for more than four centuries ere they became the real conquerors of Ireland. During this time the **two peoples were gradually mingled**, and the English language made headway. In the reign of James I of England many people from England and Scotland settled in the province known as **Ulster**. These settlers were decided Protestants, whilst the people they found in the country were for the most part members of the Roman Catholic Church. Much unhappiness resulted from the great religious wars, and feelings of hatred were fostered.

Characteristics

Notwithstanding the long oppression to which the peasantry of Ireland have been subjected, even the poorest have retained many excellent qualities. They are by nature very **courteous**, and, as far as their small means allow, they are generous. Very little seems to

make an Irishman contented and happy. He is **proud** by nature, **kind-hearted** and **grateful** for any kindness shown him. Having a keen imagination the Irish easily learn the habit of exaggeration. Though ready to fight on the least provocation, the Irishman is quick to forgive. The Irish are **witty**; they are bright, **interesting**, and intelligent; and often **eloquent**. It is often said



(Photo: A. R. Hogg, Belfast)

Gossipers in Galway

that oratory is a strong feature of the Irish race. Great Britain is indebted to Ireland for many of her best British generals, and the soldiers from Erin are noted for their **daring and bravery**. In the chapter on "Some Notable Irishmen" it will be

seen that not only the Army and Navy have benefited, but that in many other ways the sons of Ireland have added to the greatness and glory of the British Empire.

The Distressful Island

Under **Cromwell's control Ireland suffered severely** owing to the heavy fighting and drastic punishment meted out to those who opposed him, and this and other long-endured wrongs caused a spirit of hatred to grow up in Ireland against the English. Happily the improved relations of modern times have done much to remove this feeling. The ownership of the land was in the hands of the English, and this killed the spirit of the people.

In **Ulster better conditions existed**, for James I granted the farmers of Ulster reasonable conditions of ownership of land, and, thus encouraged, the people flourished. Ireland has been the unhappy victim of **famines**. The **potato famine of 1846** caused the death of over a million people, and great distress followed the reduction of the small wages of the farm labourer.

From force of circumstances the potato has become an important article of food. The acute distress just referred to caused much emigration to America, while many others left the old homes to settle in England, and almost every large English town has its Irish quarter. In harvest time many Irish farm labourers go to England and Scotland.

The tide in the fortunes of Ireland has turned, however, and the country is **increasing in wealth, industries** are more flourishing and **education is extending its benefits** throughout the land.

CHAPTER XVI

SOME NOTABLE IRISHMEN

The Iron Duke

THE first place in the list of heroes of Ireland is held by the **Duke of Wellington**. Arthur Wellesley (for

this was his name) was born in 1769, and was **sent to India** in 1797. Here he did good service under General Harris, and returned home after three years. In 1809 he took part in the **Peninsular War** and was raised to the peerage as a recognition of his victories. He became field-marshal and Duke of Wellington at the close of this war, when he drove the French across the Pyrenees. But his most



The Duke of Wellington

famous victory was the **defeat of Napoleon at Waterloo**.

In 1828 he became **Premier of the Parliament** of Great Britain and Ireland. The Duke died, full of honours, in 1852, and was buried with a state funeral in

St. Paul's Cathedral, London. At Trim, in the valley of the Boyne, where the Duke of Wellington spent his boyhood days, there stands a monument to this greatest British general.

Lord Roberts of Kandahar

Lord Roberts was born in the year 1832. In him Ireland has given Great Britain another of the greatest generals of modern days. He distinguished himself during the **Indian Mutiny**, and in the **Afghan War of 1878-9**. His great skill was acknowledged when he was appointed commander-in-chief at the renewal of hostilities, and carried out the brilliant **relief of Kandahar**. He brought the war to a close in the year 1880.



Lord Roberts

During the **South African War** (1899-1902), when the outlook was blackest, Lord Roberts was sent out to take command of the British forces. He succeeded in overcoming the Boers and helped to bring about peace. The brave general was made an Earl for his services.

Lord Beresford

Lord Charles Beresford, another son of Ireland, was born in 1846. He entered the Navy in 1859, when only thirteen years of age. He accompanied King Edward, at that time Prince of Wales, to India. Lord Charles is a brave man, and has received two medals for saving life at sea. At the **bombardment of Alexandria**

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in Egypt, in 1882, he took a prominent place as commander of the gunboat *Condor*, and did great service. In 1885 he joined Lord Wolseley in the **expedition to**



(Photo: Russell & Son)

Lord Charles Beresford

Khartoum for the relief of General Gordon. He became a Lord of the Admiralty in 1886, and since then has been acknowledged as one of Britain's most capable naval commanders.

Dean Swift

Jonathan Swift,

the famous Irish writer and churchman, was a prominent figure in the reigns of William III and Queen Anne. In 1713 he became Dean

of St. Patrick's Cathedral. Swift wrote many books, all of them clever, witty and interesting, but to the youthful reader he will for ever be known as the author of "**Gulliver's Travels,**" than which a more wonderful book was never written, according to those who have loved to follow the fortunes of the great traveller of fiction. "**The Tale of a Tub**" is another of Swift's famous works.

Some Notable Irishmen

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Edmund Burke

Edmund Burke, who was born in 1729, was another famous Irishman. He completed his education at Trinity College, Dublin. Being greatly interested in politics, he entered Parliament and made some wonderful **speeches on American affairs**, which brought him considerable fame. Burke was a great thinker, a great writer and a great orator, and his "Essays" are read to-day and are still found of interest to many people.



Dean Swift

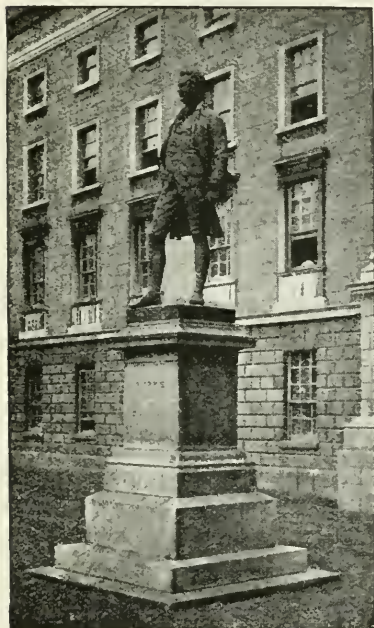
Oliver Goldsmith

The son of a poor Irish clergyman, **Oliver Goldsmith** attended Trinity College, Dublin, as a student, but left without taking a degree. Goldsmith was extravagant, and, becoming almost penniless, led a wandering life for some years. He visited France, Switzerland and Italy, supporting himself by playing on the flute. After returning to London he became known



Oliver Goldsmith

as a writer. His best known works are "**The Vicar of Wakefield,**" "**The Traveller**" and "**The Deserted Village.**"



(Photo : Lawrence, Dublin)

Burke's Statue, Dublin

Thomas Moore

Thomas Moore, the sweet singer of Ireland, lived in the first half of the nineteenth century. He was the son of a Dublin grocer. Moore attended the university of his native city and obtained a degree. He then went to London, where he was well received and given an official appointment in Bermuda. Two years later he returned to London, after travelling through Canada and the States of America. He was a loyal son of Ireland, and his **Irish Melodies**

are full of the patriot's love for his native land.

PART III—CANADA

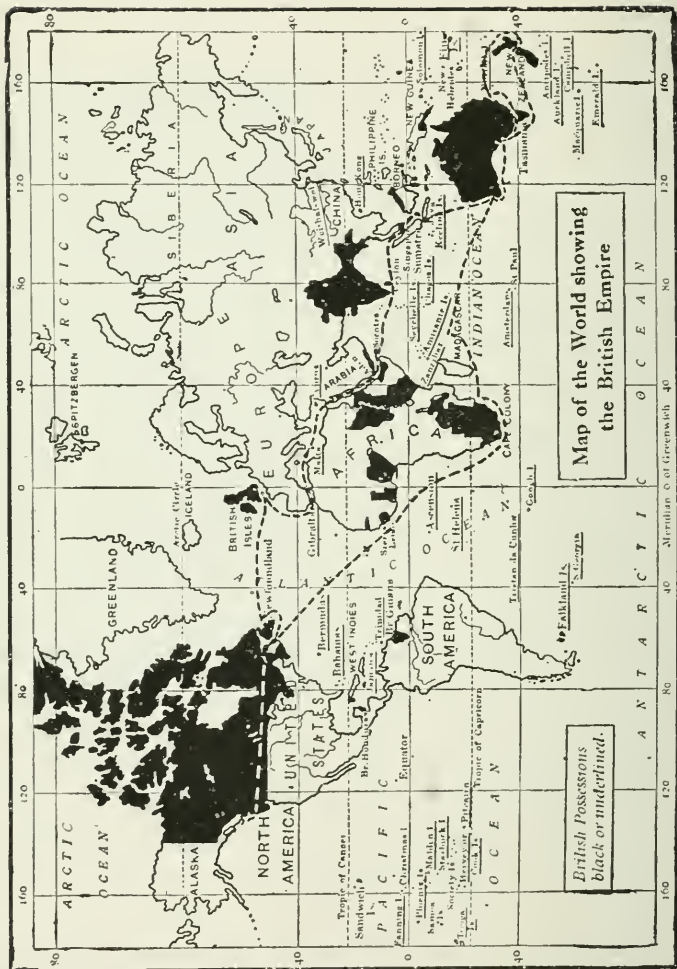
CHAPTER XVII

THE BRITISH EMPIRE

IN the preceding pages we have read in detail the geography of Scotland and Ireland, and have seen the **conditions of the people** of these two countries. We have also examined some of the reasons which have helped to produce the **splendid trade results**, while in a previous book the geography of England and Wales has been studied. In this present chapter we shall look at the three countries as a whole, because they form one kingdom, the centre of the British Empire.

Why has Britain become the premier empire of the world? It is the largest empire the world has ever known, although the British Islands, which constitute the chief part, form only a very small country compared with such countries as Canada and India. There are many reasons which we should do well to examine in order to learn why this country holds such an important position.

In the first place, **Britain occupies the most favoured natural position on the globe.** It is in the centre of the countries of the world—that is, in the



middle of the earth-mass, and this has been of immense advantage in giving it good opportunities for trade.

Climate and Industry

The climate of the British Isles is the best possible one for conditions of labour. In the north of Russia, for example, for many months of the year it is too cold for work and the seas are frozen, and navigation is thus stopped. In Spain, on the other hand, it is, for some parts of the year, too hot for work; while in North America the great and rapid differences of climate affect the workers very considerably. **Britain, however, enjoys a moderate climate**, which rarely displays extremes. The seas surrounding Britain are never frozen, and therefore navigation is not interfered with. British workmen have the greatest possible number of working days in a year, and they can if they wish do a good day's work for six days a week.

The Coast of Britain

Possessing an **excellent and long sea coast** in comparison with the smallness of the country, the British Isles has a decided commercial advantage over many other countries. All around the coast are numerous excellent harbours, which are very safe. Again, unlike the American coast, the British Isles are never troubled with icebergs, which are so great a source of danger to shipping, as well as being one of the causes of the dense fogs experienced off the coast of Newfoundland.

Mineral Wealth

The great mineral wealth of the country has contributed in a very marked degree to the national prosperity, and therefore to the exceptional growth of power as seen in the expansion of this great empire. The British Isles have long held the **foremost position in the world as a coal-mining country**. This made it possible for wind-power to be superseded by steam-power in Britain long before the windmill was discarded in other countries. The "coal age," as this period is called, is also the "steam age," and as Britain was the first coal-producing country, so it became the **greatest steam-power country**. **Iron** has been largely found in these islands in proximity to coal, and this has been of immense value, helping great Britain to become a **great manufacturing country**. Other minerals have also been found in fairly large quantities, and the presence of these has helped to enrich the country.

Internal Communications

Britain is the **home of the steam-engine** as well as of the locomotive, and the railway system was the first developed in the world. She thus had a tremendous advantage over countries relying entirely on waterways. Goods are quickly transferred from one part of the country to another. In earlier days the sailing vessels were very slow, and of little use for dealing with food produce which requires quick delivery. A Scotsman was

the **first to apply steam-power to ships.** Hence Britain was again the first in this stage in the march of progress. For centuries she has had, and still has, the largest merchant service of steamships and sailing vessels in the world. British seamanship is the most efficient because the demand for sailors has been great, and the people being islanders it is natural that there should be a good supply of sailors. The British were the first to erect lighthouses, to make breakwaters, and in other ways to lessen the chances of disaster around their coasts.

Rivers

Nature has favoured Britain with another means of communication.



The rivers are navigable throughout the year. All the larger ones are tidal. The tide helps to carry boats at a much reduced cost in fuel, besides making it possible for larger vessels

The Thames, showing the Tower Bridge to go up the river. The tide carries a large quantity of water into the bed of the river, and thereby increases its depth. Fortunately, too, there are **excellent estuaries**

which add to the value of the rivers, as they provide useful natural harbours. A **good system of canals** has also contributed to the facilities for carrying merchandise from the place of its production to the markets.

Government and Prosperity

It will not be quite so easy, perhaps, to understand the part the



The British Houses of Parliament
The "Mother of Parliaments"

Government of a country plays in the national prosperity, though this should be read in connection with this subject. Britain was the first of all nations to institute truly **representative government**. Her Parliament is in consequence known as the "**Mother of Parliaments,**" which means that foreign countries, realising the value of the British Parliament, have formed their own on the same plan. Good government is the opposite of anarchy, and in Britain property is safe, because of Government protection. If this were not so, people might work hard and be successful in business, and then have the results of their efforts taken from them by unprincipled men. The inevitable result of this

Britain and the British Empire 153

would be that other people would stop working, fearing that their labours might be in vain. In Britain, however, there has been a strong, representative and progressive government for centuries; and this has been of immense service in the development of the country.

The **expansion of the British Empire** since the days of Queen Elizabeth has provided new and excellent markets for goods. As the population continued to grow, so would the difficulties of providing the means of living have increased had it not been that large numbers of emigrants left the Motherland for the daughter colonies. **English is spoken in the colonies**, and the customs and modes of living have been fashioned on those at home, thus making it easy for emigrants from the British Isles to settle down.

Education

There is still another very important factor to which must be attributed, in part, the national growth of Britain. The **education of the people tends to better the race**, and the better educated a people becomes the higher is the standard of their life. Culture and refinement help in the production of artistic manufactures. **Technical education** develops the inventive powers, and in this way the manufactured goods are improved and their output increased. If we train the minds and hands of children, the result is that intelligent men and women are developed and they become clever workers, and the trade of the country grows in consequence.

It will be seen that education plays, and has played, a very important part in the national life. There is no limit to educational advancement, neither is there any end to national progress.

As we have seen, the **colonies provide markets** for Great Britain's manufactures, and in return **supply food products**. There is, moreover, another great benefit derived from these colonies, and one which they owe to the Motherland. **Strength gives security**. We know that the biggest and strongest boy in the school is rarely molested: but what of the weak, small boy? So it is with nations. If a country wishes to remain undisturbed in peace, it must be strong and ready to repel an attack. The Government of Great Britain realises this, and the people of the Colonies know it too, and gradually all are taking their share in the defence of the Empire. In time of national calamity, as in the South African War, the **loyalty of the Colonists** was shown in a very practical way. The Colonies are protected by the great British Navy. The nearer these Colonies are to the home country in feelings of patriotism, in trade, in defence, the better it is for all the Empire.

We must now extend our knowledge of the British Empire beyond the countries washed by the British seas. We shall study the geography of our North American Colonies in comparison with the conditions at home. We begin here because Newfoundland was the first British Colony. The Dominion of Canada is the largest Colony and one of the brightest jewels in the British Crown.

CHAPTER XVIII

BRITISH NORTH AMERICA

Pioneers

ENGLAND has never been backward in sending out brave sons to explore unknown regions. People living in an island so well situated as England naturally very readily take up such exploits. From the earliest days when King Alfred began to get together a navy, **the English have given constant proof of their love of the sea.** It is not surprising, then, that when Columbus had discovered the West Indies of America in 1492, the spirit of adventure in England should have been stirred, and that men were ready to share the adventures and the spoils resulting from them.

In 1497 **John Cabot**, a Venetian by birth, living at Bristol, **set out to find the north-west passage to India.** Though he failed in this he **discovered Newfoundland**, which is our oldest colony. The **Portuguese and the Spaniards had acquired many colonies**, the latter in Mexico, Central America and in Peru ; and the former in Brazil, and on the west coast of Africa. These colonies proved a great source of wealth to the founders, and in consequence Spain became the wealthiest country in Europe. England could not look on without



Travelling by Sledge in Canada

In the districts into which the railways have not penetrated, it is still necessary to travel by sledge during the winter months

feeling concerned about the growing power of her rivals. Spain and Portugal were holding all they could get, so that a feeling of jealousy, as well as hatred of Spain, caused our countrymen to move.

The Sea-dogs of Britain

We have all read of the **Sea-dogs**, as England's gallant sailors of Elizabeth's reign were called. They risked great dangers, which resulted chiefly from plundering Spanish vessels and ports. Sir John Hawkins, Sir Francis Drake, Sir Thomas Cavendish, Sir Walter Raleigh, Sir Richard Grenville were amongst the great men who helped to break the power of Spain, and in the end England became the "Mistress of the Seas," which proud position she still holds.

First Steps in North American Colonisation

In less than a hundred years after the sad death of Sir Walter Raleigh, in 1618, a British colony had been founded in the New World, as America was called; while to-day British North America forms a country as big in area as the continent of Europe.

Such a promising country could not be expected to remain in the possession of England without trouble and conflict. France had been very busy colonising in North America, and in her efforts, in fact, surpassed England, who, however, held possession of **Newfoundland, Nova Scotia** and the islands known as the **British West Indies**. In 1620 the *Mayflower*, carrying Puritans

who were leaving England for religious reasons, set sail for New England, as they termed that portion of North America where they landed. By 1700 the English possessed a good slice of the Atlantic coast.



General Wolfe

French v. English in Canada

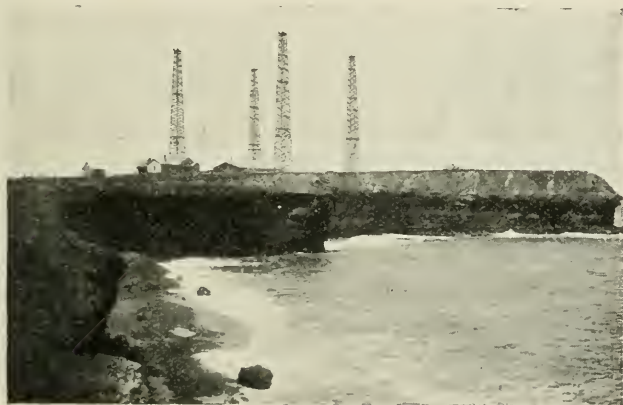
In the period covered by the **Seven Years' War** (1757-1763) England had to fight the French for possession of Canada, which was largely peopled by French emigrants. It was

due to the generalship and heroism of **General Wolfe** that Montcalm, the French general, was overthrown at Quebec in 1759, a notable date, therefore, in American history. As we know, both generals lost their lives and, with other possessions gained in North America, **Canada was ceded to England** by the treaty of Paris in 1763.

Another outstanding date in Canadian history is 1867,

when the Colonies of Quebec, Ontario, Nova Scotia and New Brunswick formed themselves into "**The Dominion of Canada**," which now includes the whole of British North America, with the exception of Newfoundland.

Let us look briefly at the various provinces before going on to consider Canada as a whole.



Cape Breton Marconi Station

Nova Scotia

Nova Scotia is the most easterly of the Colonies comprising the Dominion of Canada. It fronts the Atlantic with a rocky rampart, notched here and there by natural harbours, whence fishermen sally forth to reap the rich harvest of the sea. The hills that slope upward from the coast to the interior lead into vast forests that supply large quantities of timber. Descending westward towards the **Bay of Fundy**, or northwards towards the

Gulf of St. Lawrence, you wander through **some of the finest farming country** in the world. The north-eastern part of the province is a great island—**Cape Breton**—where coal-mining is largely carried on. Cape Breton has a wireless telegraphic station, where messages are received from and dispatched to Europe.

Prince Edward Island

Prince Edward Island, to the north-west of Nova Scotia and in the Gulf of St. Lawrence, is the **smallest province in the Dominion**. Though small it is very well cultivated.

New Brunswick

To the east of Nova Scotia is **New Brunswick**, another maritime province. This is a country of variety of scene and occupation. On the eastern coast are important seaports and fishing villages, and in the interior are vast forests giving plenty of employment to lumbermen. Parts of the colony are under cultivation.

Quebec

Adjoining New Brunswick we have the immense province of **Quebec**. The famous **River St. Lawrence** on the south flows through a region of great commercial activity, while the northern portion is scarcely explored.

In this colony there are a large number of French Canadians, descendants of the early French settlers. These French Canadians still speak French, and have many French customs and laws.

Ontario

Adjoining Quebec is **Ontario, the most popular province** in the Dominion. It also takes a prominent place as a manufacturing and agricultural centre, and may be regarded as the most prosperous of the seven provinces. It is in this province that we have the **immense lake system**. The lakes are large enough to be regarded as fresh-water seas. Their names are Ontario, Erie, Huron and Superior.

The Prairie Provinces

The chief of the prairie provinces is **Manitoba, the great granary**. To the east of Manitoba is **Saskatchewan**, and still farther eastward is **Alberta**. To reach these distant provinces was once a toilsome and difficult journey, but now great railways span the continent, and trains offering every comfort to travellers take them direct to these provinces. Even now, in some parts where the railway has not penetrated, in winter people travel by means of sledges.

British Columbia

On the Pacific coast is the province of **British Columbia**. This is an immense distance from England; from Liverpool to Halifax in Nova Scotia is a distance of 2,485 miles, and from Halifax to Prince Rupert in British Columbia is 3,746 miles by rail, making a total from Liverpool to British Columbia of 6,231 miles. Hour

after hour, as the train speeds along, the traveller looks down on a sea of mountains. Here and there are sheltered **valleys rich in gold and silver**. In these spots men have made their homes, and mining is carried on.

Government

Before we go on to consider the geography of the great Dominion which forms part of the British Empire, it will be as well to learn something about the way it is governed.

Canada is neither a kingdom nor a republic, but a Confederation of provinces, owing allegiance to the King of England, yet controlling its own affairs. For a long time after the British acquisition of Canada all Canadian affairs were controlled from London, but, eventually, it was decided to allow the various provinces to manage their own local affairs. Each province therefore formed a parliament of its own, which made laws and levied necessary taxation, while remaining quite independent of the others. This was the first step in self-government, which, in 1867, culminated in the formation of the **Canadian Confederation**. This Confederation is known as the **Dominion of Canada**, and has one great parliament made up of members elected by the provinces, with a Governor-General representing the King of England. This central Government controls affairs affecting the whole country, but it leaves local matters to the provincial legislatures. Such questions as defence, customs and finance are the concern of the Dominion Government, which has its seat at Ottawa in the province of Ontario.



(Photo: Notman, Montreal)

A Glacier in the Rocky Mountains

CHAPTER XIX

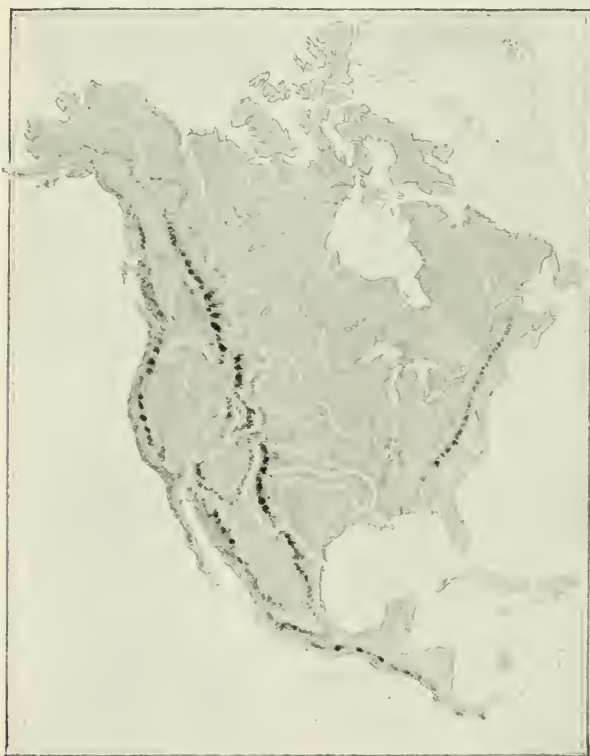
GENERAL PHYSICAL FEATURES

Factors in Prosperity

THE political and commercial importance of a country, the nature of its produce and the requirements of its people are largely dependent upon certain facts which man cannot control. These include **climate, maritime position, water supply, general surface, the nature of the soil, the prevailing winds,** and many other features, all of which play their part in the development of a country.

The Mountains of North America

With these in mind, let us see what we can learn from



Physical Relief Map of North America

Mountains, which in the north are near the coast, the **Cascade Mountains** and the range known as the **Sierra Nevada**.

the map. We must first briefly examine the map of North America as a whole. The most remarkable feature is the **great mountain ridge** which runs from **Alaska** (with Mount Mac-kinley, having an altitude of over 20,000 feet) to Central America. The chief ranges are the **Rocky**

The fact that we have a great mountain system running north and south, quite close to the western coast, enables us to divide North America into two parts. To the west of the highest parts of the Rocky Mountains we have **steep slopes** and **swift rivers**. In these

latitudes in which Canada is situated the prevailing winds on the **Pacific** are from the south-west. These are warm winds laden with moisture, which falls as rain when the winds reach an atmosphere of lower pressure. As a result the western slopes are very **fertile and well**

watered, and admirably suited to profitable fruit culture.

On the eastern side of the Rockies the **slopes are gradual**, and we should expect to find **vast plains, long,**



A Trophy from the Forest

Skinning a black bear

slow rivers and a dry climate. This is actually the case to a certain extent. The chief river system of Canada, the **St. Lawrence**, with its great lakes, has an eastward course; the **Saskatchewan** also flows eastward into **Lake Winnipeg**.



Arrival of a Consignment of Fur by Dog Trains for the
Hudson's Bay Company

In the United States, owing to the slope of the land towards the Gulf of Mexico, the great rivers have a southerly course. In Canada, on the other hand, the river basins lie in a direction from east to west. The exception to this is the Mackenzie, which flows northward through a barren region into the Arctic.

Just to the east of the Rockies we have the driest regions of Canada. Here lie the vast prairies, that are so suitable for the growth of wheat.

The Hudson Bay Regions

The ridge which separates the St. Lawrence basin from the river which flows into the **Hudson Bay** is covered on both sides with **forests**, and the **cold climate** of the Hudson Bay regions renders it of little use except for **fur-trapping**. The Hudson's Bay Company formerly ruled the whole of the North-west provinces, from which the furs were obtained. The forests of the eastern provinces provide a vast quantity of **timber** annually. The industry connected with the felling and transportation of these natural products is called **lumbering**.

Climate

The **climate of eastern Canada** is very different from that of British Columbia. It is, in fact, what is called a **continental** climate. There is no tempering influence from sea winds, and a cold current from Greenland, the "**Cold Wall**," intensifies the cold winters, in which severe blizzards are not uncommon. The summers are correspondingly hot. However, the **climate of Canada is extremely healthy**, and the dry, cold winters of **Manitoba** are said to be far better for consumptive persons than the damp, foggy November of England.

Animal Life

The plains of Canada were formerly the home of vast herds of

bison, a sort of native American buffalo; farther north abounded **moose**, corresponding to the elk and reindeer of the Old World. Now moose and bison are fast disappearing, wild prairie is being turned into fruitful orchards or corn fields, the forests are ministering to the needs of



Canadian Moose

man, and the strong race of red men is dwindling before the onward march of his white-faced brother man, the Red Indians having largely withdrawn to the north.

CHAPTER XX

THE LAKES AND RIVERS

The Lake System

WHEN we look at the map of the Dominion of Canada we are astonished at the **immense size of the lake system**. The lakes, in fact, form an important part of the great waterways of the country. They are conveniently divided into three series: **those of the Northern Plain**, the **Laurentian Lakes**, and what may be termed the **Plateau Lakes**. The vastness of these inland seas of fresh water may be gathered from the fact that one lake alone—Lake Superior—covers an area as large as Scotland. The **Laurentian Lakes**, consisting of Superior, Huron, Michigan, Erie and Ontario, **have an area of over 90,000 square miles**, and are supposed to contain more than one-third of the fresh water on the earth's surface. Four of the lakes are partly in Canada and partly in the United States of America, while Lake Michigan is wholly in the United States.

The Laurentian Lakes

Lake Superior has its northern shores in Canada. The surface of its waters is about 600 feet above the level of the sea. Between Lake Superior and **Lake**



Niagara Falls

Huron is the short river of St. Mary. Lake Huron is smaller than Superior, but has an area of 23,000 square miles. Its northern shore is in Ontario. **Lake Erie**, about 8,000 square miles in area, stands at 560 feet above the level of the sea. It is connected with Lake Huron by the **Detroit River** and **Lake St. Clair**. Lake Erie is joined at its north-east to **Lake Ontario** by the **Niagara River**.

Niagara Falls

The lakes are considerably above the sea level, the highest being Superior, from which fact it gets its name. They vary in height, from 600 feet at Superior to 230 feet at Ontario, and this difference gives rise to



Niagara Falls in Winter

cataracts, the greatest of which is the celebrated **Niagara Falls**. The force of these falls is being utilised and developed by the Government of Ontario and private firms, to provide electric power, which is conducted through cables to the manufacturing towns, where it is used to drive all kinds of machinery. The value of the falls in this direction is enormous, for there is no coalfield in the district. The grandeur of the falls is almost beyond description. The Niagara River, after its descent by rapids, makes a big leap of 160 feet.

The Northern Lakes

The lakes of the Northern Plain are not so well known, nor are they of so much interest. They are the **Great**

Bear Lake, Great Slave Lake, Athabaska and Lesser Slave Lake. These are all **connected with the great Mackenzie River**, which is 2,400 miles long.

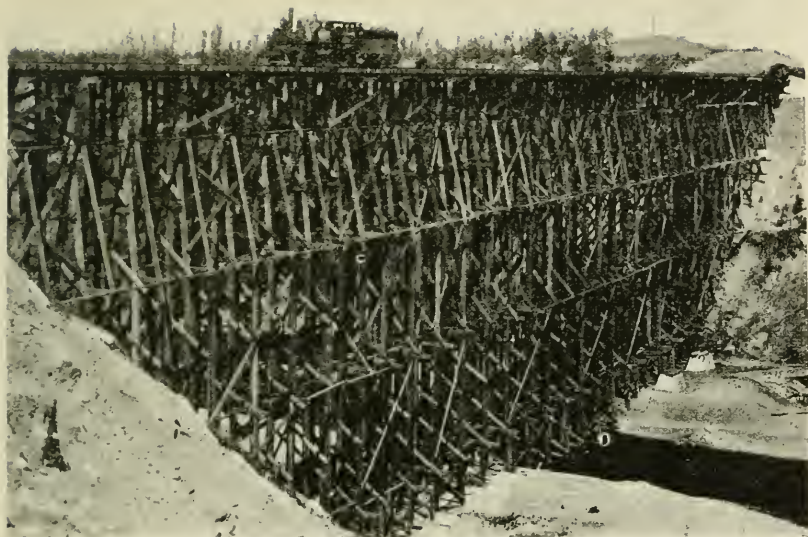
The Plateau Lakes

Lake Winnipeg, a big lake or inland sea, and **Manitoba Lake**, in the province of Manitoba, are connected with the **Nelson River**, which empties itself into the **Hudson Bay**, a great inland sea to the north opening into the Atlantic Ocean by way of **Hudson Strait**.

The Great Rivers

The greatest river of Canada, and the **most important commercially, is the St. Lawrence**. It is first called the **St. Louis**, and rises at the "Height of Lands," entering Lake Superior at its south-western extremity. Bringing with it an immense volume of water from the great lakes, it issues from Lake Ontario at **Kingston**, at which town it takes the name of St. Lawrence. Its course is marked by **numerous rapids**, and its scenery enhanced by the "**Thousand Isles**." The river flows through **Montreal** to **Quebec**. Its mouth widens into the Gulf of St. Lawrence and then into the Atlantic. Its length is 2,200 miles, and its width is in some places two miles.

The **rivers of the northern slope** are unimportant because the country is not developed, and because of their outlet being the frigid Arctic Ocean. The **Mackenzie** is the largest. On the eastern slope there are the **Churchill** and **Nelson**, which flow into Hudson Bay.



Trestle Bridge

The stream itself, though narrow, has carved a deep rift necessitating a trestle 652 feet long by 125 feet high

CHAPTER XXI

THE RAILWAYS OF CANADA

Good Rivals

CANADA possesses one of the greatest and most useful of railways: the famous **Canadian Pacific**. It is the oldest of the lines which connect the Atlantic and Pacific Provinces, but it has now several rivals in various stages of progress. The **Grand Trunk Railway**, which originally connected **Montreal**, **Toronto** and other eastern towns, has entered the contest for the Pacific trade with

a new line north of the Canadian Pacific, known as the **Grand Trunk Pacific Railway**. Another shorter line across the continent is the **Canadian Northern** from **Port Arthur**, on Lake Superior, to **Edmonton**, in Alberta. The latter is the most important among the newer centres in the North-west.

It will be sufficient to describe in some detail only one of these railways, the **Canadian Pacific Railway**. But first we must mention another line of great importance in the North-west: the **Great Northern Railway**, which, however, is really a United States line, having its main line south of the frontier of Canada.

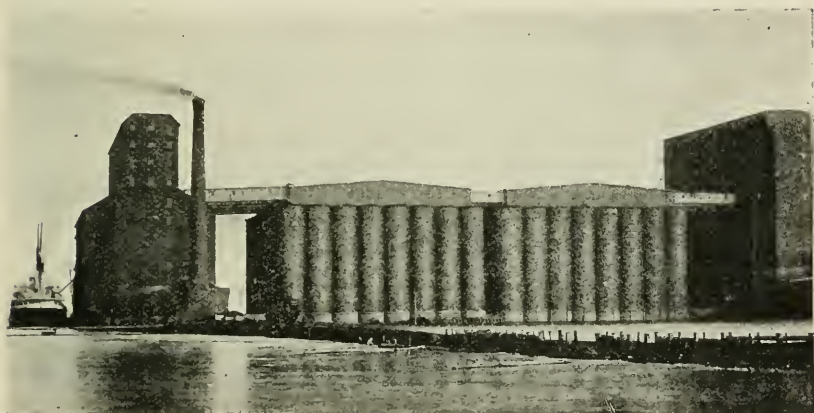
The Canadian Pacific Railway

The direction taken by the Canadian Pacific line is due to several causes. The colonisation of Canada began along the valley of Canada's great waterway, the **River St. Lawrence** and the **Great Lakes**. So the large towns naturally grew closer to these—as, for instance, **St. John** and **Halifax**; it was therefore necessary to connect the provinces of New Brunswick and Nova Scotia with **Montreal**, the chief of the cities on the St. Lawrence river. **Quebec** was also connected with Montreal.

Port Arthur

From Montreal the railway proceeds due west past **Ottawa**, the political capital of the Dominion of Canada, over the water-parting which separates the forest land of the **Hudson Bay** basin from the Great Lakes until

Port Arthur, on the shore of **Lake Superior**, is reached. Formerly known simply as a fur-trading station, Port Arthur is now one of the chief grain ports, exporting the harvests of the West, which the great railways bring to its busy quays.



(Photo: J. F. Cooke, Port Arthur, Ontario)

Grain Elevator at Port Arthur

A great storehouse for the harvests of the West

Winnipeg

Passing the well-known **Lake of the Woods**, the railway enters the **prairies** at **Winnipeg**, the chief town of Manitoba. Here we have a wonderful example of modern progress. It is not many years since the prairies were uncultivated wastes, inhabited only by Indian tribes, who made no use at all of the land except for hunting. This soil in its virgin state was rich in all that the farmer desires for the growth of crops, but the



View of the Main Range of the Rockies

Indians had neither the knowledge nor the means to develop it.

Now, however, **Winnipeg** is a prosperous and imposing city in the midst of a wheat-growing country of unrivalled fertility. There are many who already look forward to the day when Manitoba, Saskatchewan and Alberta will produce sufficient wheat to render Great Britain independent of supplies from foreign sources.

The Rocky Mountains

The Canadian Pacific Railway does not run through the newer parts of these provinces, but, passing through **Regina** and **Calgary** in Alberta, it enters the region of the Rocky Mountains. This country is famous for its scenery, and it is one of the assets of the Canadian Pacific Railway that its iron road runs through it.

Banff is a great tourist centre, and the **Kicking Horse Pass** is also famed for its mountain scenery.

The rivers of the Pacific slopes abound in fish, especially salmon, which is exported in large quantities. From **Revelstoke** steamers proceed down to southern British Columbia. The whole region is very **rich in minerals**—gold, silver, lead, copper and coal are all being mined extensively. Although the climate is so favourable and land so fertile, only a small part of British Columbia is yet cultivated for fruit-growing purposes, which is already one of the chief sources of the prosperity of the province.

Vancouver

The Pacific terminus of the railway is at **Vancouver**. This is the chief British port on the Pacific coast of North America. Steamship lines connect it with San Francisco, as well as with Japan, China and Australia.

This progressive city undoubtedly has a great future; indeed, the same may be predicted for the whole Canadian Pacific system as part of the **All-Red Route** to the East, which presents many advantages to the Englishman going to India or Australia, though without doubt there is keen competition between this route and those going westward through the United States to San Francisco, a competition that will be still keener when the Panama Canal is opened.

CHAPTER XXII

THE ATLANTIC PROVINCES

NOVA SCOTIA

THE province of **Nova Scotia** is probably associated in the minds of most English-speaking people with Longfellow's poem "Evangeline," which tells of a sad but beautiful incident in its history. Those who are interested

in the history as well as in the present state of the country, will find no better way of remembering these than by reading "Evangeline."

The occupation of the people is largely agricultural, and



Map of the Atlantic Provinces

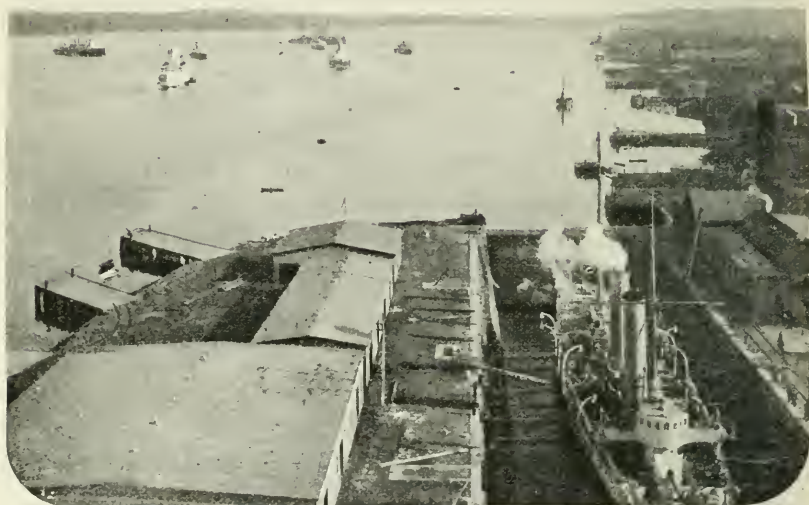
of the lands on the shores of the **Bay of Fundy** we may say that there are still "vast meadows stretched to the eastward . . . pasture to flocks without number."

The **Annapolis Valley** is famed for its apples; oats are among the most important crops, and potatoes are largely grown.

Besides the land under cultivation there is still left some of "**the forest primeval**," of which Longfellow wrote. In the days when wood was exclusively used for shipbuilding, the trees of Nova Scotia served to establish the shipbuilding industry, the chief town for which is **Yarmouth**. **Lumbering**, which was once the chief industry, is still of great importance, and much wood-pulp, for the making of paper, is manufactured.

Gold-mining, especially around **Guysborough**, is a very productive industry; whilst **Sydney** in the north is the port of the **coalfields** of Cape Breton, where iron is also found. The mining industry is the chief source of wealth both to the people and the state; the latter obtains most of its money for administrative purposes from the payments made by mine-owners for concessions for mining. The **fisheries** of Nova Scotia are of great importance, being the most valuable in the Dominion, and the Dominion Government, realising the commercial value of the industry, assist the fishermen by the payment of money, to encourage them to use the best methods.

Halifax, on the east coast, is the chief port and railway terminus; the chief railway line connects Halifax and the north with **Truro** and the mainland.



Halifax Harbour

(Photo: Notman, Halifax.)

In the foreground is a dry dock with a vessel inside

The **physical features of Nova Scotia**—a hilly peninsula with many rivers and inlets which serve as harbours—give it an interest quite apart from the prosperity of the province. The Minas Basin and the La Have River possess scenery of exceptional beauty.

The **population** of Nova Scotia numbers 493,000; of this the Acadians—as the descendants of the old French colonists are called—number about one-tenth, and most of the remainder are British. **The majority of the people are Roman Catholics.** There is representative

government by two Houses. The whole region is prosperous, and it is natural, in view of this, that the people should set a high value upon education. There are several universities, and schools of agriculture and horticulture.

NEW BRUNSWICK

The region between the estuary of the St. Lawrence river and the Bay of Fundy forms the **province of**



(Photo : Notman, Montreal)

St. John, New Brunswick

New Brunswick. In many ways it resembles Nova Scotia, having low hills, large forests, and numerous rivers. So far as these features influence the country the industries are similar to those of Nova Scotia.

On the inlet called **The Long Reach** are situated **Fredericton**, the capital, and **St. John**, the chief port.

Both have saw-mills for timber ; at St. John there are also cotton-mills, iron foundries and flour-mills.

The railway system consists of (1) the Intercolonial Lines (from **Montreal**) through **Bathurst, Newcastle,** to **Manitoba**; (2) the Canadian Pacific, through **Fredericton**; (3) the Intercolonial, **Fredericton** to **Manitoba**.

The **climate** of New Brunswick is subject to extremes, but on the whole it is healthy. In summer it is warm enough for the cultivation of wheat and fruit, but the chief agricultural products are turnips, potatoes and barley. Cattle farming is growing in importance.

Unlike Nova Scotia, New Brunswick has **little mineral wealth**. On the other hand, the forests are unusually extensive, and the climate in winter is very suitable for lumbering operations ; and it is owing to the extent of this industry that agriculture has not taken the place it has in other provinces. Moose, caribou and deer are abundant in the forests. The rivers are well stocked with fish, and the **fisheries** are extensive, though less so than those of Nova Scotia.

In **manufactures** New Brunswick is far behind other provinces, chiefly owing to the absence of mineral wealth. Paper-pulp and furniture—outcomes of the lumbering industry—are growing more extensive every year.

The principal physical features are the St. John valley. The St. John river, which is famous for its scenery, is navigable for fairly large steamers for a distance of about 150 miles. The St. Francis and the Madavaska are

tributaries of the St. John. These form natural waterways, which are also of great commercial use.

The province has a single-chamber government under the Dominion. The population numbers about 351,000, the majority of the people being of British descent. In religion they are similar to those of Nova Scotia. In both provinces the occupiers of the land are generally the owners, a condition of things which usually leads to prosperity.

PRINCE EDWARD ISLAND

Prince Edward Island is the **smallest of the Canadian provinces**, and in many respects it differs from the other eastern maritime provinces. Newfoundland is altogether exposed to the cold current from the north, and Nova Scotia is, to a less extent, exposed to the ocean; but Prince Edward Island, which lies within the Gulf of St. Lawrence, is protected by outlying islands, and, as a result, has a more moderate climate than any other eastern province.

The island is only 145 miles long in its greatest length and 34 miles wide at its widest part, the total area being 2,184 square miles. It is, however, the most densely populated province of Canada, having about 94,000 inhabitants; the majority are of British descent.

The province is still as beautiful as when Cartier discovered it in 1534. There are no hills of any importance; the island is rather low-lying, but it is protected from the sea by the sand-dunes which surround its coast. The coast itself is very much indented; this

is remarkable when we consider the sheltered situation of the island.

In spite of the generally moderate climate of the island, the spring is somewhat delayed owing to the ice which, late in the winter, stops all navigation, and makes it necessary to use ice-boats to cross to the mainland. The late spring, however, does not interfere much with **agriculture**, which is **the chief occupation** of the people. The **soil is very fertile**, and the "**mussel mud**," consisting of decayed mussel- and oyster-shells found in the bays, is used to enrich it. Besides hay, oats, wheat and potatoes, the island is beginning to produce fruit in considerable quantity. Live stock and poultry are also exported. Although about one-third of the province is covered with forests, the lumber industry is declining. Manufactures are not flourishing. The **chief port** of the island is **Charlottetown**, the capital of the province: the population is only 12,000; but it has a good harbour, and possesses fine streets and public buildings. Besides its maritime trade there are a variety of local industries, including the manufacture of boots and tobacco, and the packing of pork and lobsters.

The fisheries give employment to many of the inhabitants; oysters and lobsters are abundant, while the herring fishery is important. **Summerside**, on Bedeque Bay, is the chief fishing port.

Local government consists of a lieutenant-governor and a legislative assembly. Primary education is free and compulsory.



Map of the St. Lawrence Provinces

CHAPTER XXIII

THE PROVINCES OF THE ST. LAWRENCE BASIN

QUEBEC

QUEBEC is the **oldest of the Canadian provinces**; in fact, until some years of British rule had passed, the name Canada signified simply the settlements of Quebec and Ontario on the St. Lawrence.

The visitor to Canada who disembarks at Montreal finds himself in the province of Quebec. This province, which is situated in the east of the Dominion, occupies

both banks of the St. Lawrence and a large tract of land to the north of the gulf. It is nearly six times as large as the British Isles. Of this area a large part — the divisions of **Abitibi** and **Lake St. John** — is very thinly populated forest-land, and in the north much of the land has not yet been explored.

Besides the **St. Lawrence** itself, a large number of



Rafting down the St. Lawrence

tributaries add to the prosperity of the province. These are of great value for **lumbering**, as the logs can easily be sent down the rivers as large rafts. The **Ottawa River** is the most important of these, and the **St. Maurice** and **Saguenay** are both great rivers.

The province has **two famous waterfalls**, one near the mouth of the **Montmorency** and the other in the **St. Maurice river**. The **lakes of the province** are **remarkable for their beauty**, notably Lake St. John, Brome Lake and the lakes of the Laurentian Mountains.

Provinces of St. Lawrence Basin 187

The only other physical features of interest are the **Watchish Mountains**. This range forms the water-parting between the St. Lawrence river system and the rivers that flow northward to **Hudson Bay** and **James Bay**. A part of the coast along the latter bay is included in the province of Quebec.

The **history of Quebec** is not only very interesting, but it has also had a very great influence on the development of the province. It was originally a French colony, but the territorial ambition of the French aroused the rivalry of England, who saw in the efforts of France an attempt to prevent the growth of British power in North America. As was inevitable, the rivalry between the two nations came to a crisis, both in America and in India, in the Seven Years' War.

Matters were not going well for England, the Canadian Indians were making raids on the English colonies, and the home Government seemed powerless to improve the situation, when **Pitt**, afterwards **Earl of Chatham**, took control in 1759. He determined to strike at the fortress of **Quebec** itself, and in **General Wolfe** he found a man capable of carrying out his difficult scheme. Wolfe was sent to Canada, and, after waiting at the island of New Orleans for some time, decided to make a direct attack.

Montcalm, the French general, repulsed the attack; but Wolfe, with only 5,000 men, scaled the **Heights of Abraham** by night unobserved, and so forced the French to open battle. General Wolfe scored a glorious victory, but was killed at the moment of his triumph.

The English held the city against all the attacks of the French, and when peace came the French colonists settled down under English rule. They became good



Pumpkins grown in Quebec Province

citizens of the Empire, and to-day their descendants form by far the larger part of Quebec's loyal and progressive people.

It is necessary that we should learn more of the history of Quebec than of the other provinces of the Dominion because it is

the oldest of all, and to a great extent the history of Quebec is the history of Canada.

Agriculture in Quebec is naturally on a smaller scale than in the great provinces of the west. However, it is very successful and becoming more so every year. Field



Canadians Shooting Rapids

crops, turnips, potatoes and maple-sugar, come far behind **dairy produce**, which is the most important. There is some wheat, barley and oats, and tobacco is also cultivated. Apples are the only large fruit, but raspberries, strawberries and other small fruits grow well.



Asbestos Quarry, Quebec Province

We have already noticed the **lumbering** industry, which is chiefly carried on in winter, when the smooth compressed snow makes the ground level so that the tree-trunks are easily moved over it to the streams.

Mining is not of great importance in Quebec. An exception to this is the asbestos mines, which are the richest in the world. The Magdalen Islands possess large deposits of gypsum.

Provinces of St. Lawrence Basin 191

Towns of Quebec

Quebec ranks second among the provinces in regard to **manufactures**, Ontario holding the premier place. Undoubtedly Quebec's importance in manufactures is due to the very great amount of water-power that is available.

The **City of Quebec**, the old capital of Canada, is a picturesque, old-fashioned city, built over Cape Diamond. It possesses a university, and the legislative buildings of the province, where the Elective Assembly and the Council meet. Besides being engaged in the lumbering trade, the town has **leather and cotton factories**. Below the city lies the beautiful **Isle of Orleans**.

Montreal is really the chief city of eastern Canada, and is a place of great wealth and vast commerce. It is a port of the greatest importance, being at the head of ocean navigation on the St. Lawrence, and from it the railways radiate to the great West and to the United States.

It would be difficult to enumerate the industries of Montreal, so numerous are they. Montreal, in fact, is the largest Canadian manufacturing town. Chief among the industries are sugar-refining and cotton manufacture. Ironworks and machine shops of all kinds abound; and there are large bridge works, car shops, carriage works, tobacco factories and houses for the packing of meat.

The city holds a picturesque position on the slopes of Mount Royal, and follows the course of the river. There are two universities, and the architecture of its



Montreal, from Mount Royal

churches is said to be the finest in America. No doubt, Montreal owes its pre-eminence as **the first city in the Dominion**, and its great prosperity, to its position at the junction of the rivers, the Ottawa and the St. Lawrence.

Hull, a town facing Ottawa across the river of that name, is a **centre of the lumbering trade**, and has huge pulp- and saw-mills. It has also large woodware and match factories.

Valleyfield, on the river St. Lawrence, has large cotton and paper factories. Cotton and woollen goods are also largely made at **Sherbrooke**, a busy little city in the east; and **St. Hyacinthe**, in the same district, makes leather, shoes and woollen goods.

Provinces of St. Lawrence Basin 193

Other growing towns and ports are **Three Rivers** and **Sorel**, both on the St. Lawrence, between Montreal and Quebec.

ONTARIO

The province of Ontario is, roughly speaking, **triangular in shape**. Its extreme west touches Manitoba, its most northernly point borders James Bay, its southwestern side is washed by the lakes Ontario, Erie and Huron, while its eastern boundary lies between the St. Lawrence and the Ottawa rivers. The province is larger than the United Kingdom by 285,871 square miles, having an area of about 407,262 square miles.

It is **the most populous** and **the most wealthy province** of the Dominion of Canada. Its population numbers 2,524,000, of which more than half are Canadians by birth, the majority of the remainder coming from the British Isles. The people are well housed and prosperous, while **education** reaches a high state of efficiency. The land is largely owned by the men who work it.

The **lake counties** are flat and fertile, but the **river districts** are broken by the **Laurentian Hills**, and there are fewer large towns here than in the west, although the river attractions are great. The **Thousand Islands** in the St. Lawrence between Kingston and Brockville is one of the holiday resorts of the continent.

A chain of waterways, connected by the Rideau Canal from Kingston to Ottawa, is very beautiful, while the rapids in the St. Lawrence below Prescott are world famed for their wonderful scenery. The difficulties in the

way of navigation presented by the rapids are overcome by a series of the finest canals in the world.

The western part of Ontario is often called the "**Garden of the Province.**" Here are the largest number of industries and the best farming districts.

In the north and north-west there is much unbroken land, which in time will make excellent grazing country. Indeed, settlement is rapidly spreading, as the climate of the province is found to be very favourable to agriculture, being not too severe in winter and temperate and bracing in the summer. The district has **a wealth of minerals** and is richly timbered.

Ontario has set apart 10,000,000 acres of her vast **forests** that they may be preserved. The white pine and the magnificent Canadian spruce are abundant. From the spruce wood-pulp is largely manufactured. The mineral wealth of Ontario is very great. Here are the **largest nickel deposits in the world.** **Copper** abounds and is largely worked. **Iron is rich** and extensively produced, and west of Lake Superior there is a **gold-bearing region.**

Nickel steel, bleaching powder and various products of iron and steel come from this province. As to **climate**, Ontario has a wide range, but generally it can be compared with that of Central Europe: the summers are hot and dry and the winters have an abundance of snow. Yet the winter of Ontario is not unpleasantly severe for people who are in good health, and winter sports are one of the great attractions of the province.

Provinces of St. Lawrence Basin 195

The **farming produce** of Ontario consists of wheat, barley, oats, peas, beans, rye, buckwheat, potatoes, turnips, and, of course, grass and hay, while the raising of stock, sheep and pigs is important, and dairying takes a high place.

That Ontario is a **large fruit-growing province** is shown by the great quantities of apples, peaches, plums, pears, cherries and grapes exported.

The **culture of the grape** is very successful along the shore of Lake Erie, and a native wine is produced from it.

Fruit canning has become a great industry, and vegetables also are canned for export. A system of cold storage is now largely adopted which will preserve the fruit in the best condition. It is taken from the tree to the refrigerator car, and thence to the ship.

Many of the towns and cities are thriving centres of industry, and the residential parts have broad streets and well-kept gardens, lawns and parks, with excellent public buildings.

Towns of Ontario

Toronto is the **capital**, with a population of about 395,000. Here Canada's three big railways meet, and here, too, are the Provincial Government and legislative buildings and the universities and colleges. It is the **wholesale depot of the province**. Its **industries** include the making of agricultural implements, the packing of meat, the building of railway carriages and engines, brewing, distilling, etc.

Ottawa, on the river of the same name, is the **capital of the Dominion of Canada**, and occupies a very picturesque situation. Here are the **Parliament Houses**, three of the finest buildings on the American continent. The residence of the Governor-General, **Rideau Hall**, is also here. The people find abundant occupation in the pulp- and paper-mills, woollen factories, lumber mills, and machine and car shops. The town of **Hamilton** lies at the base of a mountain and on the shore of Burlington Bay, at the end of Lake Ontario. It is an **important lake-port** and a **busy industrial town**.

London stands at the junction of the two branches of the river Thames. It has a university and large and numerous factories. **Kingston** is the seat of the Royal Military College and of Queen's University. It manufactures agricultural implements and has large locomotive shops. Another busy manufacturing city is **Brantford**. **Peterboro** and **Guelph** are great agricultural centres, and **St. Catharines** is the centre of the fruit district.

Ontario is governed without levying taxes upon the people, the provincial funds being secured from licence fees, succession dues, the sale of Crown lands, minerals and timber. The farmers receive help and encouragement from the Dominion Government. Education is efficient, and it is possible for a scholar in an elementary school to work his way up, step by step, to the university at Ontario.

CHAPTER XXIV

THE PRAIRIE PROVINCES

MANITOBA

THE "**Prairie Province**," as Manitoba has been called, lies near the centre of the North American continent and about midway between the Pacific and Atlantic Oceans. Its area is 251,832 square miles, of which 19,906 square miles are water.

The **first settlers** were colonists from Scotland, who, in 1812, made their homes on the banks of the Red River below Winnipeg, and many of their descendants still live in



Map of the Prairie Provinces

198 Scotland, Ireland and Canada

thriving farms here or in comfortable residences which years of labour have enabled them to build.

The province is **well watered** by the Red, Assiniboine, Rainy and Winnipeg rivers. It has a rather **extreme climate**—hot in summer and cold in winter. The summer months are May, June, July, August and September—the last two being harvest months.

While the surface of Manitoba much resembles that of the rest of the prairie country, it will be noticed that it possesses the **largest lakes and the largest mountains east of the Rockies**. The soil is very rich in organic matter, and indeed it is said to be amongst the richest in the world.

This is the reason why the province possesses the **most wonderful wheat-lands** to be found in the world. Cereals and root crops flourish marvellously on "The Steppes," as this prairie land is called. Practically all the wheat that Manitoba does not require for its own consumption is sent to Europe, either in the grain or as flour made in the Canadian flour-mills.

The province is well drained by a number of lakes and rivers. These include the **Lake of the Woods**, the **Winnipeg River**, which flows into Lake Winnipeg; thence the water is carried by the **Nelson River** into **Hudson Bay**. Other parts of Manitoba are drained by the Red, the Assiniboine and numerous smaller rivers.

Winnipeg is the chief lake. It is almost 200 miles long. Other lakes are Winnipegosis, Manitoba, Swan and Shoal.

The **chief mountains** are the **Duck**, the **Porcupine** and the **Riding Ridges** in the west, the **Turtle** and the **Tiger Hills** in the south. The **largest forest** is near Duck Mountain. Much of the province is bare of trees, but in the west there are fairly large forests, and from these the settlers obtain most of their timber.

Wheat-growing and "**ranching**"—that is, the rearing of cattle and sheep on a large scale—are the **principal industries**. Enormous quantities of beef, pork, and other meats are sent to the eastern markets. **Lumbering** is carried on for home consumption, and during recent years **manufactures have developed** largely at Winnipeg and the other towns.

The **valuable fisheries of the Ontario lakes are shared by Manitoba**, and a large number of men are engaged in this industry. Pike, sturgeon, pickerel, trout and other white fish are plentiful.

Towns of Manitoba

It is not many years since what is now the important city of **Winnipeg** was but a small settlement, for in the year 1872 its inhabitants numbered only 240 people. To-day it is a thriving town with a population of about 137,000. Here most of the railways of the province have their centre; in fact, it has no fewer than fourteen railways running from it. Trains are now plying between Winnipeg and Tete Jaune Cache in British Columbia, on the main line of the Grand Trunk Railway, with the most modern Pullman and dining-cars.

The town occupies a commanding position at the confluence of the Assiniboine with the Red River, and forms **a gateway to the west**. It has numerous waterways, which, taken in conjunction with its railways, give the necessary conditions for the development of commerce and industry. Indeed, the growth of Winnipeg is pro-



Lumbermen at rest after a heavy day with
the timber

ceeding so rapidly that it promises shortly to become the largest city in Canada, and bids fair to hold a similar position in the Dominion to that held by Chicago in the United States.

Brandon is the **second city of importance** in Manitoba; it is situated 132 miles west of Winnipeg on the main line of the Canadian Pacific. It has machine shops and other **factories**, and carries on a large **wholesale grain trade**.

Portage la Prairie is another progressive **commercial town**. The name **Portage** indicates that this is one of many places where it is necessary for canoes with their contents to be carried from one river to another. **Morden** and **Carberry** are **flourishing railway centres** in the midst of a fine wheat-growing district, as are also **Neepawa, Minnedosa, Dauphin** and **Doloraine**, each of which possesses excellent facilities for the storage and shipment of grain.

Before the white man appeared to take up the cultivation of these vast prairies, the **buffalo** roamed at large and provided the chief means of support for the natives. This animal is now becoming scarce, and would soon be extinct but for the fact that the Government is preserving a few herds in the **parks of Alberta**, and that in the wildest parts of the north a few still roam at large.

The hills and forests abound with **deer, moose** and **antelope**; and such beasts of prey as **wolves, bears** and **lynx** are still to be found there in considerable numbers. On the lakes and ponds **wild ducks and geese** are plentiful, and the prairie is the home of large flocks of chickens, which, with the shooting of game, afford much profitable sport, and is therefore much resorted to by sportsmen.

SASKATCHEWAN

Saskatchewan, the centre of the three Prairie Provinces, lies to the west of Manitoba and to the east of Alberta,

its southern border stretching along the north of the United States for 390 miles. It is just about the same size as Manitoba, and much of its surface is occupied by numerous small lakes. The largest of the lakes are **Reindeer Lake, Wollaston Lake, and Lake Athabaska** in the north, and **Lac la Rouge** and **Candle Lake** farther south.

Not only do lakes abound, but the country is **well watered by the Saskatchewan River** and its tributaries. It is a fast-flowing river which enters the province on its western side, and after running eastward for 200 miles, flows north-east until it empties its waters into Lake Winnipeg. It is navigable for a considerable part of its course. Other important rivers are **the Carrot and Assiniboine Rivers**, and the **Qu'Appelle River**, which is famed for its beautiful scenery, and flows through a rich agricultural district.

The **prairie district** lies in the east, and this portion of the province stretches out before the eye like an unending sea of grass, broken only by the fields and homesteads of enterprising settlers, who have discovered that beneath the surface grass lies soil of the most wonderful fertility.

To the north the dreariness of the prairie gives place to beautiful undulating country, intermingled with copse and glade, winding rivers, gentle brooks and picturesque lakes. The scenery of the west is varied by ranges of hills and open plains, with here and there clumps of poplar, birch and willow.

The main line of the Canadian Pacific Railway runs across the province from east to west, and numerous branches run in all directions from the main line. The Canadian Northern Railway runs from Winnipeg to Edmonton. It has several important branch lines. The province is also being opened up by the Grand Trunk Railway.

As we should naturally expect, settlement follows the railway lines and along the banks of the Saskatchewan River and its branches; but until the close of the last century the province was very sparsely populated. Since the year 1900 settlement has grown very rapidly, and to-day the south-eastern and centre parts are plentifully dotted with homesteads, whereas the north-eastern part is heavily wooded. There are, however, many districts yet unoccupied, but as the railways intend to extend their branches, it is certain that settlement will continue for many years to come.

Towns of Saskatchewan

Regina is the **chief city** and the **seat of government**, at the head of which is a Lieutenant-Governor. Its population is about 30,000, but each year sees a large increase in the number of its inhabitants. Indeed, the populations of all the towns and cities of the province are rapidly increasing.

The largest town is **Moosejaw**, with over 14,000 inhabitants, and some of the other thriving towns are **Prince Albert**, **Saskatoon**, **Weyburn** and **Battleford**.



Ranching on the Prairie: Branding a Steer

The south-east of the province is a magnificent wheat-growing region, and grain grows well, as a rule, in the south-west, though the occasional dry seasons spoil that part of the province. It is not an unusual sight to see vast fields of wheat stretching as far as the eye can reach, the straw, capped with fine, heavy heads, reaching a height of five feet.

A good deal of the south-west is given over to **cattle-ranching**, and large numbers of cattle and horses roam at large about the plains. **Dairy farming** is carried on in the verdant park lands. About the wild lands of the north animals are hunted for the sake of their fur, and the **coyote**, or prairie wolf, the **fox**, the **badger**, the **skunk** and the **gopher** are caught in the prairie.

As we have seen, the **chief products are agri-**

cultural, such as wheat, oats, flax, barley ; and vegetables and small fruit are also grown. Horses, cattle, hogs and poultry are fed. **Coal** for fuel is found in the south. The **chief exports are wheat and cattle.**

ALBERTA

Alberta in many ways resembles Saskatchewan, which lies on its eastern side, while the Rocky Mountains separate it from Columbia on the west. It is about twice as large as Great Britain and Ireland. The mountain scenery to the west of Alberta is unequalled, even by the Alps of Switzerland. The lofty peaks are crowned with eternal snow, and great streams flow from them to the plains below.

Four principal rivers water the province, each of which has its source in the Rocky Mountains, and thence flows to the east or north-east. They are **the North and the South Saskatchewan**, which later join to form the one large river of that name, the **Peace River** and the **Athabaska**. These rivers have numerous tributaries.

The largest of its many **lakes** is the **Athabaska**, 120 miles long ; the **Lesser Slave Lake** is 60 miles long. The lakes cover over one and a quarter million acres of the surface of the province ; from which it will be seen that Alberta is well supplied with water and facilities for drainage.

The **plains of South Alberta** are about 3,000 feet above the level of the sea, and the high lands, of course,



Harvesting on the Prairie

are higher still. These high lands make an ideal home for delicate people. Many men who would languish or die at lower levels grow strong and healthy here. Notwithstanding its great height above the sea level, the cold is not so intense as in the eastern prairies, for the mild "**Chinook**" wind blows over the mountains from the Pacific Ocean, and has the same effect on the climate as the Gulf Stream has on England.

Railways have been constructed through the south and centre of the province, and each year sees them extending farther, but the northern part is as yet beyond the reach of the railway.

The Canadian Pacific with two lines crosses the plain on its way to the mountains, where one climbs the **Crow's Nest** and the other **Kicking Horse Pass**. The Grand Trunk and the Canadian Northern run into the province.

In the days of the Hudson's Bay Company's rule Alberta was the home of the cattle king and the cow-

boy. No one thought then of tilling the land, which was considered too dry for crops, and herds of cattle roamed over it. But now **vast stretches of prairie** have been taken up by settlers and successfully cultivated. Where the rainfall is insufficient, **irrigation has been introduced and canals have been made.** The **cattle ranch still flourishes** at the foot of the hills, and the cattle that feed on the prairie hay yield beef of the finest quality.

In the centre of Alberta are beautiful park-like stretches of land, where **wheat and oats are largely**

grown. Here the farmer finds the best feeding for cattle, and butter-making is a notable industry.

In the north are **rich forests.** This part of Alberta is **crossed by** numerous rivers, which provide valuable waterways for the small craft and shallow-draught steam-boats of the traders.

Agriculture is the most important industry of Alberta, but **coal is abundant** near the surface, and is largely **mined at Lethbridge** in the south. Farther south still, another large coalfield has been opened.



Typical Canadian Scenery



Royal North-West Mounted Police



Lumbermen at Work

Towns of Alberta

To show the rapid growth of **Edmonton**, which is **the capital of the province**, we have only to think of it as having in 1901 only 2,620 inhabitants, whereas to-day its population exceeds 31,000. Formerly but a small fur-trading depot in the wilds, Edmonton is now a prosperous city. A fine **Parliament House** has been erected, and large stores, modern schools, beautiful churches and other public buildings have been well arranged by skilled architects. Another sign of growth may be seen in the **University of Alberta**, which has been founded in Edmonton. The city has electric lighting, good waterworks, telephone communication and other up-to-date systems.

Strathcona, on the North Saskatchewan River opposite Edmonton, is another rapidly growing city, and **Calgary**, with a population of over 43,000, is the chief city in the south. It is situated in the pleasant valley of the **Bow River** and on the main line of the Canadian Pacific Railway. Other towns of importance are **Medicine Hat**, **Macleod**, **Lethbridge**, **Cardston**, **Fort Saskatchewan** and **Leduc**.

CHAPTER XXV

THE PACIFIC PROVINCE: BRITISH COLUMBIA

Scenery and Climate

ON crossing the western border of Alberta the traveller is struck with the great change in the landscape. A towering wall of mountain heights gradually breaks

upon his view as he enters British Columbia, the most westerly province of Canada. As the train carries the traveller along he beholds mighty peaks, whose tops are capped with snow all the year round, standing as sentinels over a vast stretch of lower heights covered with rich forests.

Here are deep gorges with rivers twist-



Map of the Pacific Province

ing in and out on their way to the distant sea, and long lakes reflecting in fantastic shapes the mountains amongst which they nestle. Here and there amongst the mighty **Rockies** men make homes for themselves. The earth enriches them with its precious treasures of **gold, silver** and **coal**, and the fertile valleys yield plentiful crops of **apples, plums, peaches, pears** and other fruits.

The atmosphere becomes mild, then moist and balmy, reminding the Englishman of the most favoured parts of the Mother Country. Continuing his journey onward to the west, the traveller will at length arrive at the shores of the great Pacific Ocean, and find himself in a busy city whose harbour affords anchorage for ships from Japan, Australia, China and many other parts.

Extent

British Columbia includes **Vancouver, Queen Charlotte** and other islands along the western coast of the Dominion of Canada. The length of the province is about 700 miles and its breadth over 500 miles. The coast is much indented, and both the mainland and Vancouver have a number of good harbours, including **Barclay Sound, Howe Sound, Burrard Inlet** and the mouths of the rivers **Skena** and **Naas**.

Mountains

Along the line of the coast runs a range of mountains known as the **Coast Range**; between this and the Rockies the plateau of Utah and Nevada is continued.

Here there is so little rain that irrigation is necessary to get good results from the cultivation of the land, but vegetation is luxuriant along the borders of the lakes and rivers.



A Salmon Cannery on Fraser River

Rivers

The **chief rivers** are the **Fraser**, **Columbia**, **Skeena** and **Naas**. They, in common with the lakes, abound in excellent salmon and other fish, and herrings, cod, sturgeon, soles and halibut are found in the bays.

In the wild parts the **elk** and **bear** still exist, and the **mountains** afford pasture for **sheep** and **goats**, while the **prairie chicken**, **duck**, **quail**, **goose** and **deer** are common

Forests.

Nowhere is there a greater **wealth of forest**, and the timber of British Columbia is very valuable for building purposes. The **principal trees** are the **pine, fir, hemlock, cedar, oak** and **willow**. The **Douglas fir** is next in size to the giant fir-trees of California. The hills and plains are covered with "**bunch grass**," on which great herds of cattle thrive wonderfully, as it is very nutritious.

Industries.

The province contains **vast tracts of arable land** which yield very heavy crops. **All the usual grains** grow well, and large crops of roots (turnips, carrots, etc.) and hay are raised, while ordinary **garden vegetables**, such as tomatoes, melons, etc., are largely cultivated. Indian corn, sugar beet and tobacco are also valuable products; and as the province is well suited for **cattle-rearing**, dairying is largely carried on, and good butter is produced in great quantities.

Thus we see that **lumbering, cattle-rearing, agricultural pursuits, fruit-growing, hunting** and **fishing** largely occupy the people.

Mineral Wealth.

We have not yet noticed **the discovery of gold**, which in 1858 brought the province so prominently before the world and first attracted emigrants to British Columbia. In one summer alone over 33,000 men



Seeking for Gold in a River Bed

came from the mining camps of California to hunt for the precious metal in the valleys of the River Fraser and its tributaries. A similar discovery in the mountains of Cariboo caused another rush of miners from all parts of the world. It is estimated that gold to the value of £25,000,000 has been taken away.

Large quantities of **silver, copper and lead** are also exported. **Coal** is another of the treasures of this rich country, **Crow's Nest** and **Vancouver** containing the largest coalfield. Building stone and clay for brick-making are also found in abundance.

Towns

Victoria, on the coast of Vancouver Island, is the capital of **British Columbia**. It is the **second sea-**

port of the Dominion, and the headquarters of the Canadian fur-sealing fleet. In climate and surroundings it bears a strong resemblance to English towns. Three miles away is **Esquimalt**, a fine fortified harbour.



Water Front, Prince Rupert Terminus, G.T.P. Railway

The city of **Vancouver** is the **largest in the province**, and is the western terminus of the Canadian Pacific Railway. Its population is over 124,000. Other towns are **New Westminster**, near the mouth of the Fraser River, **Nanaimo**, **Yale**, **Vernon**, **Nelson**. **Rosslund**, **Kalso** and **Sandon**. **Prince Rupert**, on Kaien Island, is the Pacific terminus of the Grand Trunk Pacific Railway.

CHAPTER XXVI

THE WILD NORTH

ALTHOUGH the area of the Canadian provinces is actually greater than that of the United States of America, it must be remembered that the great region known as the **North-West Territories** is not yet put to any very profitable use. The whole of the territory north of the **Cariboo Mountains** is quite unfitted for any sort of agriculture, and far south of this we find the almost uninhabited country round the shores of Hudson Bay. The east coast of that part of the Territories east of Hudson Bay is called **Labrador**. It is under the government of Newfoundland.

Following any of the rivers which flow into the southern part of Hudson Bay, we notice that the forests are thin and the trees stunted in growth, thus presenting a strong contrast to the lofty, dense masses of pine and spruce to be seen farther south. The birch, which is largely produced, provides the bark used by the Indians in making their light canoes.

These rivers are the home of the **beaver**, and as these animals are trapped for the sake of their fur, a few words about them will not be out of place.

The beaver belongs to the rodents, as those animals

are called which have teeth specially adapted for gnawing (other rodents are rabbits, mice and squirrels). It is perhaps the most remarkable of all rodents, for it uses its teeth to fell trees. A tree which will fall into the river when cut through is chosen by the animals. Then, by much hard work with their sharp teeth, the beavers cut through the trunk, and the tree falls down. Branches are heaped about the fallen tree to form the dam, on which the beavers build their domelike homes.

The entrances to these strange little houses are always under water: the webbed feet of the beaver enable it to swim well. Every summer whole colonies of beavers leave their homes, to return again as winter draws near. They generally go back to their old quarters, though solitary male beavers are sometimes found.

Of the other animals of the north we have already noticed the **moose**, and farther north, beyond the limits of tree vegetation, lives the **cariboo**, or **American** reindeer, which is very valuable to the Eskimos and those Indians who live so far north. It feeds on the white lichen, which is only found in Arctic regions.

Perhaps it is hardly necessary to describe the **seal** and the **walrus**—sea animals which are found on the northern coasts. The fur of the seal is of great value, and the tusks of the walrus provide very white ivory.

From what we have noticed it will be seen that the inhabitants of the North-West Territories depend almost entirely on the fur trade for their support. This has always been of great importance to Canada, and before



An Eskimo Colony

the establishment of direct British government, not only the North-West but also a large part of the prairie was ruled by the British **Hudson's Bay Company**. This company received its charter from King Charles II, and for a long period exercised a monopoly in the land over which it ruled.

The North-West Company, a later venture, interfered with this, but after long competition and an irregular warfare, the Hudson's Bay Company succeeded in retaining its monopoly. The Canadian Government bought out the rights of the company in 1869, but it still trades in the

furs brought down the rivers from the hunting-grounds by the Indians and trappers, and seal skins are obtained from the seals captured on the coast. Indeed, the Hudson's Bay Company is still the foremost British fur-trading company.

The **Eskimos**, the people who inhabit the coldest regions, are to be found in Labrador, along the north coast and in the islands around. They belong to the Mongolian or Yellow type. They are short in stature, but their strength is extraordinary, so that they are well suited to the climate in which they live. Naturally they are very primitive in their manner of living; they clothe themselves in skins and live on such animals and fish as they can find. In winter they live in huts made entirely of snow. In summer they leave their winter homes to live in huts made of skins. The Eskimos are both despised and hated by the Indians who come into contact with them; but the Indians, who also live a wandering life, are mostly found farther south.

On the coast of **Labrador** traces are found of another and greater race of people. Long before Columbus made his memorable voyage to the West Indies, some Norse adventurers had crossed from Norway to Iceland, and thence to Greenland. It is believed that they did actually reach the mainland of America, and that remains of certain round towers which have been found in recent years are evidences of this.

In the far North-West, in the **Yukon** and on the frontier of **Alaska** is the **Klondike district**, famed for its gold. The discovery of gold there was followed by a rush of

thousands of miners and other men from Canada, the United States and many other parts, men who were willing to risk everything in a mad desire for wealth. Confusion, much privation and disappointment followed, but the confusion soon subsided, and the gold district has lost much of its importance owing to the fact that the supply of gold did not equal the early expectations.

The Yukon, which has an area of 207,076 square miles and a population of 8,000, has quite a moderate climate considering its northerly situation. The **Mackenzie Bay** is of some importance as a base of the whale fishery.

Law and order in the Wild North are maintained by the Royal North-West Mounted Police. They carry out much work of assistance to the Department of Customs, and also in respect of the preservation of game, notably bison, and of the fighting of forest fires.

Ever since the Tudor days, when Canada was supposed to consist simply of a few large islands, daring explorers have made desperate attempts to discover a **North-west passage** through the Straits between the islands off the north coast of Canada.

If we look at the globe we shall see why this exploration was undertaken. The explorers expected to find a new route from the Atlantic to the Pacific. After many other Englishmen had tried unsuccessfully to do so, in 1850 Sir Robert McClure succeeded in finding the passage, but it proved to be of no use as a trade route, as it is blocked with ice during the greater part of the year.

CHAPTER XXVII

NEWFOUNDLAND

Geographical Situation and History

It was in the year 1497, during the reign of Henry VII, that **John Cabot**, a British sailor, discovered England's first colony, to which was given the name **Newfoundland**. This is a distinct colony and does not form part of the Dominion of Canada. If we look on the map we see that Newfoundland is an island of irregular three-cornered shape. It measures 317 miles in length and 316 breadth. The island lies in the Atlantic Ocean at the entrance of the Gulf of St. Lawrence, and is separated from Labrador by the **Belle Isle Straits**.



Map of Newfoundland

It is very probable that Newfoundland may have

been visited by Frenchmen before Cabot landed there, for it was soon known that French fishermen looked upon its shores as valuable fishing-grounds and paid them a visit each year at the fishing season. Indeed, it was the French who first laid claim to the island, as belonging to Canada. They held it until 1713, when it was **given over to England by the Peace of Utrecht** and became a British possession. To this day there are many French people in Newfoundland, and French fishermen catch the cod along its northern shores and land there to dry the fruit of their toil.

Physical Features

The **coast is very roughly indented**, especially on the east, and numerous small islands lie off the mainland. **Miquelon and St. Pierre**, both French, are the only ones worth naming. Part of the interior of Newfoundland has not been explored, but the land that is known is **very hilly**, about **one-third is covered with lakes**, and bogs and swamps abound.

The **best harbours are found along the eastern coast**. **White Bay, Trinity Bay, Fortune Bay** and the **Bay of Islands** afford good anchorage for ships.

The **Blue Hills**, in the centre of the island, and **Long Range**, in the south-west, give rise to many small rivers.

Climate

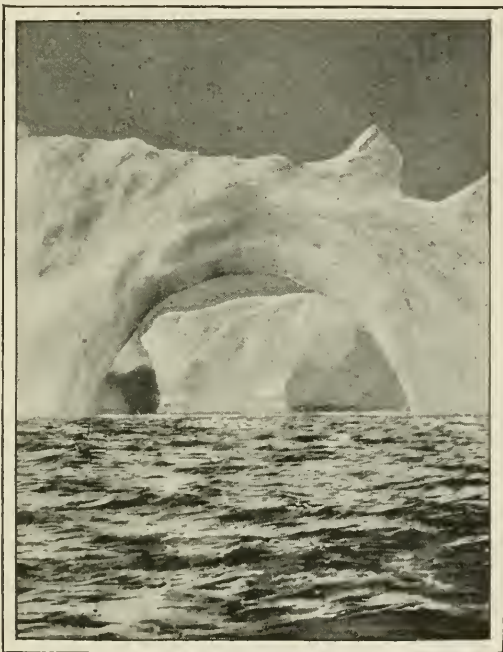
Newfoundland has a **healthy climate**, and does not experience such extremely hot summers and cold winters

as are to be found in Canada. But the **fogs**, which are frequent along the coast, are very unpleasant. They are caused by the warm air given off by the Gulf Stream meeting the cold air which arises from the Labrador current.

The "**Banks**" of Newfoundland are an immense shoal lying fifty miles off the east coast. As we have just noticed, it is off the coast of Newfoundland that the **warm waters of the Gulf Stream meet a cold current** flowing southwards from the Arctic regions and along the coast of Labrador. The cold

water brings **icebergs** with it, and these are thawed by the warm Gulf Stream. As the icebergs melt, the stones and soil which they hold are released and fall to the bottom of the sea. In this way, in the course of centuries the "Banks" have been formed.

In the waters over the Banks of Newfoundland we



Icebergs

find the **greatest cod fishing-ground in the world**. The fish is dried on the shore in the sun and then taken by boats to Europe.

While the shores provide an industry for the people who live on the coast, the interior of the island gives occupation to many settlers, and the agricultural products are increasing every year. Oats, potatoes and barley are the chief crops; there is also a growing interest being taken in cattle-rearing. The valleys and hillsides are richly covered with trees of good growth, and a large and important lumber industry has arisen in the island, and large mills turn out annually many tons of paper made from wood-pulp. The paper is exported chiefly to England.

During recent years it has been found that parts of Newfoundland are **rich in minerals**, chiefly **copper, coal and iron**. **Gold** is also found. **Slate** is largely quarried.

From the sources which we have mentioned Newfoundland **exports** vast quantities of dried cod, cod-liver oil, tinned lobsters, pickled herrings, seal skins and seal oil, copper ore, iron, coal, gold and slate.

St. John's, on the peninsula of Avalon, is the **capital of the island**. It stands at the head of a beautiful and finely protected harbour, and is well fortified. It is the nearest port to Europe on the American continent, and is only 1,675 miles from Cape Clear on the west of Ireland. A railway line now crosses the island from St. John's, and the port is growing more important each year.

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